Set Items Description 949581 AUDIO? OR VIDEO? OR PHOTOGRAPH? OR MULTIMEDIA? OR MULTI() M-S1 EDIA? GRAPHIC? OR PICTUR? OR PICTOR? OR MUSIC OR SONG? ? OR MOVI-S2 · 426412 E? ? OR MOTION() IMAGE? S3 JUKEBOX? OR MPEG OR JPEG OR DVD OR DVDS OR DIGITAL()(CONTE-NT? OR DATA OR INFO OR INFORMATION?) S4 INTEGRAT?()MEDIA? OR DIGITAL()(VIDEO OR VERSATIL?)()(DISC? OR DISK?) S5 8099324 DEVICE? OR UNIT? ? OR MODULE? ? OR APPLIANCE? OR EQUIPMENT? OR SERVER? S6 1623656 CONTROLLER? OR COMPUTER? OR CPU OR CPUS S7 936945 CENTRAL() PROCESS? OR PROCESSOR? OR MICRO() PROCESS? OR DATA-() PROCESS? OR MICROCOMPUTER? OR WORKSTATION? OR WORK() STATION? 2298487 S8 CHIEF? OR MAIN OR MANAGER? OR MANAGING? OR MASTER? OR CENT-ER? OR CENTRAL? S9 4173328 HUB OR HUBS OR PRIMARY OR PRINCIPAL OR CONTROLLER? OR CONT-ROLLING? OR CONTROL S10 2033259 MULTIP? OR MULTIT? OR SEVERAL? OR NUMEROUS? OR MORE(2W)ONE OR TWO(2W) MORE OR ASSEMBLY? OR ASSEMBLIE? 595330 COLLECTION? OR NETWORK? OR LAN OR WAN OR LANS OR WANS OR I-S11 NTERNET? OR ETHERNET? OR EXTRANET? S12 ONLINE? OR INTRANET? OR COMMUNICAT?()SYSTEM? OR WAP OR WAPS 277984 OR LIBRAR? OR ARCHIV? OR VARIET? SYNCHRON? OR SYNCRON? OR COINCID? OR SIMULTAN? OR (RENDER? S13 952821 OR MAKE?) () IDENTICAL? OR IDENTICALIZ? OR IDENTICALIS? ("SAME" OR IDENTIC? OR SIMILAR?)()TIME? ? OR SYNC?? OR SYN-S14 325200 K?? OR CONTEMPORAN? OR CONCURREN? OR COOCCURR? OR CO()OCCUR? S15 358964 UPDAT? OR UP(2W)DATE OR RESET? OR REFRESH? OR RELOAD? OR R-ESTOR? OR RENEW? OR REENABL? S16 PATCH? OR UPGRAD? OR FIXUP? OR REGENERAT? OR REPLENISH? OR 199699 REVITAL? OR REJUVENAT? DOWNLOAD? OR DOWN()LOAD? OR UPLOAD? OR UP()LOAD? OR INSTAL-S17 1016510 L? OR (DOWN OR UP) () LINK? OR DOWNLINK? OR UPLINK? RETRIEV? OR STORE? OR STORING? OR STORAG? OR RECORDING? S18 2566592 (DATA OR FILE? OR RECORD?) (3N) (TRANSFER? OR TRANSMI? OR OF-S19 381837 FLOAD? OR UNLOAD? OR FEED? OR FLOW?) S20 ARQPRO OR ARQ() PRO OR AUDIOREQUEST() PRO OR AUDIO() REQUEST(-) PRO OR AMX OR REQUEST() (MULTIMEDIA OR MULTI() MEDIA) 3215979 S21 IC=(G06? OR H04N? OR H04L? OR G09B? OR G10H? OR G06T? OR H-04H? OR G11B? OR H04M?) S22 2176511 MC=(T01? OR T05? OR W03? OR W04? OR W06? OR X22? OR W02?) S23 S20 AND S13:S14 S24 103428 S1:S4 AND S5:S7 AND S13:S14 S25 27204 S24 AND (S8:S9 OR S10:S12)(5N)S5:S7 S26 S24 AND S15:S19(7N)S13:S14 14368 S27 37486 S25:S26 S28 S27 AND S15:S16 AND S17:S19 AND S8:S9 AND S10:S12 326 S29 6471 S27 AND S13:S14(7N)S15:S19(7N)S1:S4 S30 2625 S29 AND S8:S12(7N)S5:S7 S31 2428 S30 AND S21:S22 S32 S31 AND S1:S4(5N)S5:S7 AND S8:S12(5N)S5:S7 AND S13:S14(5N)-15:S19 S33 1576 S31 AND S1:S4(5N)S5:S7 S34 1576 S33 AND S8:S12(7N)S5:S7 S34 AND S8:S9 AND S10:S12 S35 395 S35 AND S15:S19(10N)S13:S14 S36 331 S35 AND S15:S19(5N)S1:S4 S37 345

\$38

S39

S40

35

614

288

S28 AND S37

S36 AND S37

(S28 OR S37) AND S21:S22

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288
S41
                S40 AND S21:S22
                S28 AND S41
           33
S42
S43
           40
                S23 OR S38 OR S42
       821543
S44
                PR=2002:2005
           39
                S43 NOT S44
S45
S46
           39
                IDPAT (sorted in duplicate/non-duplicate order)
S47
          164
                S39 AND S13:S14/TI
                S47 AND S1:S4/TI
          121
S48
                S48 AND S15:S19/TI
           78
S49
                S49 NOT S44
S50
           69
S51
                IDPAT (sorted in duplicate/non-duplicate order)
           69
S52
          100
                S46 OR S51
? show files
File 347: JAPIO Nov 1976-2005/Feb (Updated 050606)
         (c) 2005 JPO & JAPIO
File 350: Derwent WPIX 1963-2005/UD, UM & UP=200546
         (c) 2005 Thomson Derwent
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?

52/3,K/1 (Item 1 from file: 347)

DIALOG(R) File 347: JAPIO

(c) 2005 JPO & JAPIO. All rts. reserv.

07638064 **Image available**

MULTIMEDIA SYNCHRONIZATION METHOD AND DEVICE

PUB. NO.: 2003-131918 [JP 2003131918 A]

PUBLISHED: May 09, 2003 (20030509)

INVENTOR(s): CARTER HARRY B III
COCOCCIA RONALD
PIECH ZACHARY

REINE JOHN SAUTER SILVAN VASQUEZ STEVEN WILLIS CRAIG

YOUN HYUNG-JUN BRUTUS

APPLICANT(s): REQUEST MULTIMEDIA

APPL. NO.: 2002-177726 [JP 2002177726]

FILED: June 18, 2002 (20020618)

PRIORITY: 01 884661 [US 2001884661], US (United States of America),

JAPANSION,

JAPANSION

JENSION

June 19, 2001 (20010619)

MULTIMEDIA SYNCHRONIZATION METHOD AND DEVICE

INTL CLASS: G06F-012/00; H04N-005/765; H04N-007/173

ABSTRACT

PROBLEM TO BE SOLVED: To provide an apparatus and system for providing recorded **multimedia** programming in digital form, in a multimedia player device.

SOLUTION: A system for synchronizing a multiplicity of devices in a multimedia environment has at least one central storage and interface device , where audio , video and photographic information including content information and content management information, relating to at least one user, are stored in digital form. The system further has a plurality of zones, each having a zone-specific storage and interface device , capable of storing or interfacing information stored into the central storage and interface device , where audio , video or photographic information, relating to at least one user, contained within each one of the plurality of zone-specific storage and interface devices and the central storage and interface device , are updated in relation with other zone-specific storage and interface devices and the central storage and interface device.

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52/3,K/3 (Item 3 from file: 347)

DIALOG(R) File 347: JAPIO

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06037768 **Image available**

RECORDING DEVICE, RECORDING SYSTEM AND RECORDING METHOD

PUB. NO.: 10-320868 [JP 10320868 A] PUBLISHED: December 04, 1998 (19981204)

INVENTOR(s): KATSUYAMA AKIRA

TAKENAKA YOSHIAKI

APPLICANT(s): SONY CORP [000218] (A Japanese Company or Corporation), JP

(Japan)

APPL. NO.: 10-041970 [JP 9841970] FILED: February 24, 1998 (19980224)

RECORDING DEVICE, RECORDING SYSTEM AND RECORDING METHOD

INTL CLASS: G11B-015/02; H04N-005/7826

...JAPIO CLASS: Equipment); 44.6 (COMMUNICATION

...JAPIO KEYWORD: Video Tape Recorders, VTR); R131 (INFORMATION PROCESSING

... Microcomputers & Microprocessers)

ABSTRACT

PROBLEM TO BE SOLVED: To provide a recording device, a recording system and a recording method capable of completely recording a program reserved for video recording even if the broadcasting time of the program reserved for video recording is advanced because of the extended broadcasting of a previous program...

...SOLUTION: When the video recording reservation of timer video recording is set, the audio mode of a program reserved for video ...SOLUTION: When the video is selected. An audio mode identifying signal is supplied recording from an audio multiple decoder 15 to a controller 31 for controlling an operation during timer video recording , and the audio mode of a received signal is determined. During timer video recording , determination is made based on video recording time as a reference as to whether the audio mode of the received signal is coincident with a mode or not, and when coincidence is determined, video is started. A difference in time until both audio modes recording coincide with each other is counted, added to video recording finishing time and then the video recording time is renewed .

(Item 6 from file: 350) 52/3,K/15 DIALOG(R) File 350: Derwent WPIX (c) 2005 Thomson Derwent. All rts. reserv. 016738704 **Image available** WPI Acc No: 2005-063001/200507 XRPX Acc No: N05-054482 Image data decoding method in personal computer, involves performing motion compensated prediction operation in graphics processor using processed image data and storing context data for different video streams at same time Patent Assignee: HITACHI AMERICA LTD (HITA) Inventor: PEARLSTEIN L; SAZZAD S M Number of Countries: 001 Number of Patents: 001 Patent Family: Patent No Kind Date Applicat No Kind Date Week US 6829303 B1 20041207 US 99442363 Α 19991117 200507 B Priority Applications (No Type Date): US 99442363 A 19991117 Patent Details: Patent No Kind Lan Pg Main IPC Filing Notes US 6829303 9 H04N-007/12 В1 Image data decoding method in personal computer , involves performing motion compensated prediction operation in graphics processor using processed image data and storing context data for different video streams at same time Abstract (Basic): A motion compensated prediction operation is performed in graphics processor using processed image data. Multiple sets of context information is stored in the decoder circuit for different video streams at the same time , where each set of stored context information that includes vertical/horizontal size and frame rate data, corresponds to different encoded video data streams processed by the decoder. For decoding MPEG -2 image data/ video data in central unit in personal computer , and digital high definition processing television (HDTV... ... Increases the computer system's ability to perform video decoding operations, at lower implementation cost of decoder hardware circuit... ... The figure shows a block diagram of the computer system with video front end processor for decoding encoded video Title Terms: COMPUTER ; International Patent Class (Main): H04N-007/12 International Patent Class (Additional): H04N-011/02 H04N-011/04 Manual Codes (EPI/S-X): T01-J10D W03-A11G W04-P01A4

(Item 11 from file: 350) 52/3,K/20 DIALOG(R) File 350: Derwent WPIX (c) 2005 Thomson Derwent. All rts. reserv. 015948454 **Image available** WPI Acc No: 2004-106295/200411 XRPX Acc No: N04-084527 Client- server data synchronization method in computer network , involves providing information to server to enable database to synchronize stored graphical control and data, in response to user Patent Assignee: TRILOGY DEV GROUP INC (TRIL-N) Inventor: GAWISER B C; TOUB J B Number of Countries: 001 Number of Patents: 001 Patent Family: Patent No Kind Date Applicat No Kind Date Week US 6674450 B1 20040106 US 2000549270 Α 20000414 200411 B US 2000567303 Α 20000508 Priority Applications (No Type Date): US 2000567303 A 20000508; US 2000549270 A 20000414 Patent Details: Patent No Kind Lan Pg Main IPC Filing Notes US 6674450 B1 18 G06F-003/00 CIP of application US 2000549270 Client- server data synchronization method in computer involves providing information to server to enable database to synchronize stored graphical control and data, in response to user interaction Abstract (Basic): A web page with dynamic HTML code corresponding to an interactive data-bound graphical control , is provided to a client (220). The client interprets the codes using web browser application and determines a user interaction with the displayed graphical control . A server (230) is provided with information to enable the database to **synch**ronize stored graphical control and data, in response to the user interaction. 1) computer readable medium having set of instructions for synchronizing client-side and server -side data... ...2) client- server data synchronization apparatus... ...3) method of processing data requests received at server computer; ...4) computer readable medium including program requests to process data requests received at server computer; ...5) client- server data synchronization system... ... For synchronizing client-side and server -side data using interactive data-bound graphical control, in computer networks such as

...The interactive data-bound graphical controls are interactively manipulated by the user and corresponding data on the server is modified without the user needing to install executable software other than the standard Internet browser software...

Internet , local area network (LAN).

```
...The figure shows a data flow diagram explaining the data communication between client and server computers.
...
... server (230
...Title Terms: SYNCHRONISATION;
International Patent Class (Main): G06F-003/00
International Patent Class (Additional): G06F-015/163 ...
... G06F-017/30
Manual Codes (EPI/S-X): T01-J12B1 ...
... T01-N02A2C ...
... T01-N03A1 ...
... T01-N03B2 ...
```

... T01-S03

52/3,K/23 (Item 14 from file: 350) DIALOG(R) File 350: Derwent WPIX (c) 2005 Thomson Derwent. All rts. reserv.

015300909 **Image available** WPI Acc No: 2003-361843/200334

XRPX Acc No: N03-288915

THIS APPLICATION Device synchronization system in multimedia environment, user specific information stored in zone specific devices based on information stored in central storage /interface device

Patent Assignee: REQUEST MULTIMEDIA (REQU-N); CARTER H N (CART-I); COCOCCIA R (COCO-I); PIECH Z (PIEC-I); REINE J (REIN-I); SAUTER S (SAUT-I); VASQUEZ S (VASQ-I); WILLIS C (WILL-I); YOUN H B (YOUN-I)

Inventor: CARTER H B; COCOSIA R; LIYUNG-JUN B Y; PICCH Z; REINE J; SAUTER S ; VASQUEZ S; WILLIS C; CARTER H N; COCOCCIA R; PIECH Z; YOUN H B Number of Countries: 004 Number of Patents: 004

Patent Family:

Patent No Kind Date Applicat No Kind Date Week US 20020194309 A1 20021219 US 2001884661 A 20010619 200334 B GB 2379533 A 20030312 GB 200213763 Α 20020614 200334 JP 2003131918 A 20030509 JP 2002177726 Α 20020618 200339 DE 10227038 A1 20030626 DE 1027038 Α 20020617 200341

Priority Applications (No Type Date): US 2001884661 A 20010619 Patent Details:

Patent No Kind Lan Pg Main IPC Filing Notes

US 20020194309 A1 15 G06F-015/16 G06F-017/30 GB 2379533 Α 46 G06F-012/00 JP 2003131918 A DE 10227038 A1 G06F-017/30

Device synchronization system in multimedia environment, user specific information stored in zone specific devices information stored in central storage /interface device

Abstract (Basic):

The audio, video and photographic information specific to a user are **stored** digitally in **central** storage/interface **device** . Several zone specific storage/interface devices in various zones, are connected to the **central device** . The information in the zone specific devices, is updated based on information stored in the device so that a user located in any zone, is enabled to access the updated information.

An INDEPENDENT CLAIM is included for device synchronization method...

- ...For **synchronizing** multimedia recorders and players such as CD, players, MP3 player, VCR connected to satellite/radio/microwave/cellular networks and used in car, boat, airplane, etc...
- ... Since updated user specific information is stored in zone specific devices in various zones, the user located at any zone is enabled to access the updated information, simply and easily...
- ... The figure shows a flowchart explaining the synchronizing , downloading and updating multimedia content from the master to subordinate digital multimedia devices .

Title Terms: DEVICE ; International Patent Class (Main): G06F-012/00 ...

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... G06F-015/16 ...
... G06F-017/30
International Patent Class (Additional): G06F-009/00 ...
... H04N-005/765 ...
... H04N-007/173
Manual Codes (EPI/S-X): T01-J05B4P ...
... T01-J07D1 ...
... T01-N01A2A ...
... T01-N01D1 ...
... T01-N02B1 ...
... T05-H05E ...
... то5-новс ...
... W03-G08 ...
... W04-B10C ...
... W04-C10A1 ...
... W04-C10A2 ...
... W04-G01B8 ...
... W04-K10 ...
... W06-B01C7 ...
... W06-C01C9 ...
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... X22-J13

52/3,K/25 (Item 16 from file: 350) DIALOG(R) File 350: Derwent WPIX (c) 2005 Thomson Derwent. All rts. reserv. 014786720 **Image available** WPI Acc No: 2002-607426/200265 XRPX Acc No: N02-481015 Complementary data delivering for remote controlling of devices through network, involves transmitting audio data synchronized with video data to personal digital assistants and telephones through corresponding networks Patent Assignee: CLOUTIER J (CLOU-I); MILEWSKI A E (MILE-I); SMITH T M Inventor: CLOUTIER J; MILEWSKI A E; SMITH T M Number of Countries: 001 Number of Patents: 001 Patent Family: Patent No Kind Date Applicat No Kind Date US 20020077117 A1 20020620 US 2000736430 A 20001215 200265 B Priority Applications (No Type Date): US 2000736430 A 20001215 Patent Details: Patent No Kind Lan Pg Main IPC Filing Notes US 20020077117 A1 9 H04M-003/42 Complementary data delivering for remote controlling of devices through network, involves transmitting audio data synchronized with video data to personal digital assistants and telephones through corresponding networks Abstract (Basic): A command is received through a telephone network for synchronous transmission of complementary data . The complementary data having audio and video data is synchronously transmitted to the receiving devices (120,130) such as PDA, telephone through corresponding network . 2) Telephone controlling method; and... ...3) Appliances controlling method...For delivering complementary data to remotely control devices through network e.g. public switched telephone network (PSTN) where voice mail servers are controlled by phones which are connected to the voice mail servers Utilizes the flexibility of a mobile and/or handheld device such as PDA to control another device through the network . Facilitates the provision of several services as the PDA can be carried to different locations to control different devices for synchronous transmission of complementary data Receiving devices (120,130 ... Title Terms: CONTROL; International Patent Class (Main): H04M-003/42 Manual Codes (EPI/S-X): T01-M06A1A0 ...

... T01-N02B1

... T01-N01D1 ...

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(Item 17 from file: 350)
52/3,K/26
DIALOG(R) File 350: Derwent WPIX
(c) 2005 Thomson Derwent. All rts. reserv.
             **Image available**
014624071
WPI Acc No: 2002-444775/200247
XRPX Acc No: N02-350388
  Synchronization of bulk data transfers to end node devices in
              network by sending initial schedule messages prior to
  broadcast of content
Patent Assignee: NAVIC SYSTEMS INC (NAVI-N)
Inventor: CAMERON K; FAGNANI M; HALL P; KAMENTSKY L; KANOJIA C; KILLER R;
  LACROIX J
Number of Countries: 024 Number of Patents: 003
Patent Family:
Patent No
              Kind
                     Date
                             Applicat No
                                            Kind . Date
                                                           Week
             A1 20020606 WO 2001US45533 A
WO 200245423
                                                 20011115
                                                          200247
US 20020122427 A1 20020905 US 2000253369
                                            P
                                                 20001128 200260
                             US 2001969530
                                            Α
                                                 20011002
EP 1346571
               A1
                  20030924
                             EP 2001990784
                                                 20011115
                                            Α
                                                          200363
                             WO 2001US45533 A
                                                 20011115
Priority Applications (No Type Date): US 2001969530 A 20011002; US
  2000253369 P 20001128
Patent Details:
Patent No Kind Lan Pg
                         Main IPC
                                     Filing Notes
WO 200245423 A1 E 55 H04N-007/10
   Designated States (National): CA JP MX
   Designated States (Regional): AT BE CH CY DE DK ES FI FR GB GR IE IT LU
   MC NL PT SE TR
US 20020122427 A1
                        H04L-012/28
                                      Provisional application US 2000253369
EP 1346571
                       H04N-007/10
              A1 E
                                     Based on patent WO 200245423
   Designated States (Regional): AT BE CH CY DE DK ES FI FR GB GR IE IT LI
   LU MC NL PT SE TR
  Synchronization of bulk data transfers to end node devices in
  multimedia
               network by sending initial schedule messages prior to
  broadcast of content
Abstract (Basic):
           10) are connected to TV displays (20) and promotions (30) can be
    presented in various multimedia formats that may be simultaneously
    active in the video displays. The multimedia delivery system
    includes a promotional server subsystem (200) and a promotion agent
    subsystem for periodic collection of viewer usage data, I.e. history
    of channels watched and responses, while delivery is performed using a
    database server (210), a promotions manager server (220) and bulk
    data servers (230).
            Synchronizing bulk data
                                       transfers to end node devices
     multimedia
                  network .
        . . .
...Promotional server subsystem (200...
...Database server (210...
                         server (220...
... Promotions manager
...Bulk data servers
                       (230
Title Terms: SYNCHRONISATION;
```

```
International Patent Class (Main): H04L-012/28 ...
... H04N-007/10
...International Patent Class (Additional): H04N-007/025
Manual Codes (EPI/S-X): T01-N01D1 ...
... T01-N02A2B ...
... W02-F10H ...
... W03-A16C5
```

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52/3,K/30
              (Item 21 from file: 350)
DIALOG(R) File 350: Derwent WPIX
(c) 2005 Thomson Derwent. All rts. reserv.
014116832
             **Image available**
WPI Acc No: 2001-601044/200168
XRPX Acc No: N01-448278
  Computer system has queue storage and control logic unit concurrently
  transforming data between processor interface and memory controller,
  while transferring data between expansion bus interface and graphic
 bus interface .
Patent Assignee: COMPAQ COMPUTER CORP (COPQ )
Inventor: CHIN K T; COFFEE C K; COLLINS M J; JOHNSON J J; JONES P M; LARSON
  J; LESTER R A; PICCIRILLO G J; STEVENS J C
Number of Countries: 001 Number of Patents: 001
Patent Family:
              Kind
Patent No
                    Date
                             Applicat No
                                           Kind
                                                  Date
                                                           Week
US 6247102
              B1 20010612 US 9847876
                                                19980325
                                            Α
                                                          200168 B
Priority Applications (No Type Date): US 9847876 A 19980325
Patent Details:
Patent No Kind Lan Pg
                        Main IPC
                                    Filing Notes
                   33 G06F-013/14
US 6247102
             В1
  Computer system has queue storage and control logic unit concurrently
  transforming data between processor interface and memory controller,
  while transferring data between expansion bus interface and graphic
 bus interface
Abstract (Basic):
           A queue storage and control logic unit (104) coupling CPU
    interface (130), graphics bus interface (150), expansion bus interface
    (160) and memory controller (140) of interface apparatus, transfers
    data between CPU interface and memory controller, while concurrently
    transferring
                  data between expansion bus interface and graphic bus
    interface.
           An INDEPENDENT CLAIM is also included for method for
    concurrently processing bus cycle information in a computer system
... Computer system...
... Bus bridge of the computer system is capable of coupling multiple
    buses and attains high performance by allowing transaction between the
   buses to occur concurrently , thereby increasing overall system
    performance significantly...
... The figure shows the block diagram of bridge logic unit .
... Control logic unit (104...
... CPU interface (130...
...Memory controller (140...
... Graphic bus interface (150
Title Terms: COMPUTER;
International Patent Class (Main): G06F-013/14
```

Manual Codes (EPI/S-X): T01-H05B

52/3,K/32 (Item 23 from file: 350) DIALOG(R)File 350:Derwent WPIX

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013556611 **Image available**
WPI Acc No: 2001-040818/200105

XRPX Acc No: N01-030466

Multimedia **file distributio**n system for networked client server **environment**, transmits multimedia file **to user** simultaneously, based on transmission protocol and status information received from network

Patent Assignee: UNIFREE LLC (UNIF-N)

Inventor: REDMOND S D

Number of Countries: 021 Number of Patents: 001

Patent Family:

Patent No Kind Date Applicat No Kind Date Week WO 200064111 A1 20001026 WO 2000US10126 A 20000414 200105 B

Priority Applications (No Type Date): US 99295000 A 19990416

Patent Details:

Patent No Kind Lan Pg Main IPC Filing Notes

WO 200064111 A1 E 45 H04L-012/64

Designated States (National): CA CN JP

Designated States (Regional): AT BE CH CY DE DK ES FI FR GB GR IE IT LU MC NL PT SE

Multimedia file distribution system for networked client server environment, transmits multimedia file to user simultaneously, based on transmission protocol and status information received from network

Abstract (Basic):

- for selected multimedia file from the user, and transmission protocol of user system and status information from the network. Based on the received transmission protocol and status information, a multimedia file comprising precompressed and pre-encrypted multimedia data file, is transmitted to the user simultaneously.
 - e.g. video -on-demand (VOD) system, network based real-time streaming video system, for distributing audio files, still image and/or high resolution image file data e.g. X-ray, MRI, etc., in client- server system for high speed network communications e.g. ISDN, DSL cable modems, etc., and also for transmitting streaming video file data directly to user's television set or PC using internet communication protocols...
- ...Provides a looping file arrangement in which several client receive the same multimedia file on multiple network channel, without providing multiple copies of the same media file for each request of that file. Provides multiple -level encryption technology which permits the server to fully control both the access and use of given multimedia file. Permits multiple user access to the same multimedia file, thereby eliminating the need for multiple copies of single multimedia file...
- ...The figure shows the block diagram of **multimedia** file client/ **server** system...
- ... File distribution server (12...

...Title Terms: SIMULTANEOUS;
International Patent Class (Main): H04L-012/64

DIALOG(R)File 350:Derwent WPIX (c) 2005 Thomson Derwent. All rts. reserv. 013518481 **Image available** WPI Acc No: 2001-002687/200101 XRPX Acc No: N01-002288 Audio - video data recording -reproducing unit has multichannel input-output provisions that operate simultaneously with option to implement single channel inputs/outputs simultaneously over all Patent Assignee: MATSUSHITA DENKI SANGYO KK (MATU) Number of Countries: 001 Number of Patents: 001 Patent Family: Patent No Kind Date Applicat No Kind Date JP 2000285549 A 20001013 JP 9988707 Α 19990330 200101 B Priority Applications (No Type Date): JP 9988707 A 19990330 Patent Details: Patent No Kind Lan Pg Main IPC Filing Notes JP 2000285549 A 5 G11B-015/02 Audio - video data recording -reproducing unit has multichannel input-output provisions that operate simultaneously with option to implement single channel inputs/outputs simultaneously over all modules Abstract (Basic): The individual modules (22,24) handle multichannel record-reproduce operations simultaneously through the internal controllers (32,34). The controllers are coupled by the dual input RAM (26) that makes it feasible to record and reproduce single channel material simultaneously through both modules , with the content processors (40,42) coupled through a delay control circuit (56). For recording and reproducing audio and video data... ...It constitutes an extremely flexible, versatile set- up capable of serving several clients simultaneously The figure illustrates the case of two modules that are part of the centralized recording-reproducing unitIndividual modules (22,24... ...Internal controllers (32,34... ...Contents processors (40,42... ...Delay control circuit (56 Title Terms: AUDIO ; International Patent Class (Main): G11B-015/02 Manual Codes (EPI/S-X): W04-K05

(Item 25 from file: 350)

52/3,K/34

52/3,K/37 (Item 28 from file: 350)

DIALOG(R) File 350: Derwent WPIX

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013070033 **Image available**
WPI Acc No: 2000-241905/200021

XRPX Acc No: N00-182013

Audio reproduction controller for CD system regenerates music disc from each CD synchronously which is then amplified

Patent Assignee: MORIMOTO T (MORI-I)

Number of Countries: 001 Number of Patents: 001

Patent Family:

Patent No Kind Date Applicat No Kind Date Week
JP 2000057679 A 20000225 JP 98242526 A 1998081 200021 B

Priority Applications (No Type Date): JP 98242526 A 19980812

Patent Details:

Patent No Kind Lan Pg Main IPC Filing Notes

JP 2000057679 A 6 G11B-019/02

Audio reproduction controller for CD system regenerates music disc from each CD synchronously which is then amplified

Abstract (Basic):

- ... Various music data is reproduced synchronously from several CD players (2). Each reproduction signal is amplified by separate amplifier (3). The amplified output...
- ... Synchronizing circuit synchronizes the timing of music output from set of players...
- ... Music is enjoyed according to user's desire, since music data is reproduced synchronously. Exclusive speaker is connected to each player, thereby real quality of vocal is reproduced...
- ... The figure shows block diagram of audio reproducing controller .

Title Terms: AUDIO ;

International Patent Class (Main): G11B-019/02

...Manual Codes (EPI/S-X): W04-E02A3 ...

... W04-R01E

52/3,K/38 (Item 29 from file: 350) DIALOG(R) File 350: Derwent WPIX (c) 2005 Thomson Derwent. All rts. reserv. **Image available** 013016456 WPI Acc No: 2000-188307/200017 XRPX Acc No: N00-139816 Control system of multi-channel acoustic and video signal transmitter, controls operation of multiplexer which multiplexes encoded acoustic and video signals while simultaneous data transmission is performed Patent Assignee: MATSUSHITA DENKI SANGYO KK (MATU) Number of Countries: 001 Number of Patents: 001 Patent Family: Patent No Kind Date Applicat No Kind Date Week JP 2000031934 A 20000128 JP 98196285 Α 1998071 200017 B Priority Applications (No Type Date): JP 98196285 A 19980710 Patent Details: Patent No Kind Lan Pg Main IPC Filing Notes JP 2000031934 A 11 H04J-003/22 Control system of multi-channel acoustic and video signal transmitter, controls operation of multiplexer which multiplexes encoded acoustic and video signals while simultaneous data transmission is performed ... Abstract (Basic): NOVELTY - Several acoustic signal encoders (3,5,7) and video signal encoder (9) perform compression encoding of respective signals. The encoded signal is multiplexed by multiplexer (13). The operation of multiplexer is controlled by encoders (3,5,7)and transmission controller (12) while simultaneous transmission is performed. DETAILED DESCRIPTION - An external data transmitting buffer (11) stores external control data from external apparatus... ... USE - For transmitting multichannel acoustic and video signal via transmission line... ...DESCRIPTION OF DRAWING(S) - The figure shows the block diagram of multi-channel acoustic and video signal transmission apparatus. (3,5,7) Acoustic signal encoders; (9) Video signal encoder; (12) Transmission controller; (13) Multiplexer. Title Terms: CONTROL; ... International Patent Class (Additional): H04N-007/08 ...

... H04N-007/081

... W03-A

Manual Codes (EPI/S-X): W02-K02 ...

52/3,K/42 (Item 33 from file: 350)
DIALOG(R)File 350:Derwent WPIX

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012708499 **Image available**
WPI Acc No: 1999-514608/199943

XRPX Acc No: N99-384243

Cable television CATV telephone system used in simultaneous audio broadcasts - has central installation which executes simultaneous audio broadcasts on each terminal equipment via internal and external audio buses regardless of operation of switching system

Patent Assignee: MATSUSHITA DENKI SANGYO KK (MATU) Number of Countries: 001 Number of Patents: 001

Patent Family:

Patent No Kind Date Applicat No Kind Date Week
JP 11225222 A 19990817 JP 9837983 A 19980205 199943 B

Priority Applications (No Type Date): JP 9837983 A 19980205 Patent Details:

Patent No Kind Lan Pg Main IPC Filing Notes

JP 11225222 A 6 H04M-011/00

Cable television CATV telephone system used in simultaneous audio broadcasts...

- ...has central installation which executes simultaneous audio broadcasts on each terminal equipment via internal and external audio buses regardless of operation of switching system
- ... Abstract (Basic): NOVELTY A central installation (2) receives a broadcast transmission demand transmitted from any one of the terminal equipments (3-8) connected to the installation via a bidirectional CATV network (1). The installation then executes simultaneous audio broadcasts on each terminal equipment via internal and external audio buses regardless of the operation of a switching system (21). DETAILED DESCRIPTION - The switching system forms a corresponding channel when speech communication between the central installation and the terminal equipments are executed. Internal audio audio buses transmit data within a master route center unit (23) and slave route center units (24,25), while external buses transmits audio data between the master and the slave route center units .

... USE - For simultaneous audio broadcasts...

...ADVANTAGE - Obtains stable, high-level audio broadcast service even when circuits contained within switching system breaks down.

DESCRIPTION OF DRAWING(S) - The figure shows the component block diagram of the CATV telephone system. (1) Bidirectional CATV network;

(2) Central installation; (3-8) Terminal equipment; (21) Switching system; (23) Master route center unit; (24,25) Slave route center units.

...Title Terms: SIMULTANEOUS;
International Patent Class (Main): H04M-011/00
International Patent Class (Additional): H04H-001/08 ...

... H04L-012/18 ...

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... H04M-003/00 ...

... H04M-003/42 ...

... H04N-007/16

...Manual Codes (EPI/S-X): W02-D01 ...
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... W02-F05A

52/3,K/44 (Item 35 from file: 350)
DIALOG(R)File 350:Derwent WPIX
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012488739 **Image available** WPI Acc No: 1999-294847/199925

XRPX Acc No: N99-221424

Reproduction controller of multimedia disk drive - sets reproduction timing based on which data from disc and external device are

regenerated synchronously

Patent Assignee: HITACHI LTD (HITA)

Number of Countries: 001 Number of Patents: 001

Patent Family:

Patent No Kind Date Applicat No Kind Date Week
JP 11098467 A 19990409 JP 97255384 A 19970919 199925 B

Priority Applications (No Type Date): JP 97255384 A 19970919 Patent Details: Patent No Kind Lan Pg Main IPC Filing Notes JP 11098467 A 17 H04N-005/93

Reproduction controller of multimedia disk drive...

- ...sets reproduction timing based on which data from disc and external device are regenerated synchronously
- ...Abstract (Basic): NOVELTY The data retrieved from the external device (2) is stored in the memory of reproduction unit (3). The storage of external data is made in synchronize with data stored in the disk (1). During regeneration, both disk data and external media are regenerated synchronously as basic and additional data based on set timing. DETAILED DESCRIPTION The retrieved data is output through an audio and view output unit. The accessing of data in the external device is performed, based on access indication...
- ... USE For multimedia disk drive e.g. for CD-ROM, CD, CD-G, DVD
- ...ADVANTAGE The synchronous regeneration of latest data received through internet is carried out, thereby reduces user's burden.

 DESCRIPTION OF DRAWING(S) The figure shows the block diagram of reproduction controller . (1) Disk; (2) External device; (3) Reproduction unit .

... Title Terms: CONTROL ;

International Patent Class (Main): H04N-005/93

International Patent Class (Additional): H04N-005/85

Manual Codes (EPI/S-X): W04-C10A ...

... W04-F ...

... W04-F01

52/3,K/55 (Item 46 from file: 350)

DIALOG(R) File 350: Derwent WPIX

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011558824 **Image available**
WPI Acc No: 1997-535305/199749

XRPX Acc No: N97-445722

Computer system for real-time applications with multimedia devices coupled to expansion bus and multimedia bus - has 1st multimedia device for performing multimedia bus transfers simultaneously on data lines of both expansion bus and multimedia bus, in response to generating signals on bus indicating multiple bus transfer

Patent Assignee: ADVANCED MICRO DEVICES INC (ADMI)

Inventor: LAMBRECHT A

Number of Countries: 001 Number of Patents: 001

Patent Family:

Patent No Kind Date Applicat No Kind Date Week US 5682484 A 19971028 US 95559664 A 19951120 199749 B

Priority Applications (No Type Date): US 95559664 A 19951120

Patent Details:

Patent No Kind Lan Pg Main IPC Filing Notes

US 5682484 A 12 G06F-013/00

Computer system for real-time applications with multimedia devices coupled to expansion bus and multimedia bus...

- ...has 1st multimedia device for performing multimedia bus transfers simultaneously on data lines of both expansion bus and multimedia bus, in response to generating signals on bus indicating multiple bus transfer
- ...Abstract (Basic): bus, such as the PCI bus, and also includes a dedicated real-time bus or multimedia bus. Multimedia devices such as video cards, audio cards, etc., as well as communications devices, transfer real-time data through a separate bus without requiring arbitration for the PCI bus...
- ... Multimedia devices transmit addressing and control information for a multimedia bus transfer either over the PCI bus or using a separate serial control channel. The multimedia bus may also comprise separate multimedia channels for different data types. Periodic multimedia data is transferred over the multimedia bus...
- ...ADVANTAGE Provides increased performance over current **computer** architectures. **Computer** system provides much greater performance for real-time applications than prior systems

Title Terms: COMPUTER;

International Patent Class (Main): G06F-013/00

Manual Codes (EPI/S-X): T01-H05B4 ...

... T01-J30

52/3,K/63 (Item 54 from file: 350) DIALOG(R) File 350: Derwent WPIX (c) 2005 Thomson Derwent. All rts. reserv. 010971553 **Image available** WPI Acc No: 1996-468502/199647 XRPX Acc No: N96-394758 Music reproduction appts. for e.g. videoke - has image-reproduction unit equipped with several sets of reproduction appts. that performs changing of background drawing suitable to music information read by Patent Assignee: VICTOR CO OF JAPAN (VICO) Number of Countries: 001 Number of Patents: 001 Patent Family: Patent No Kind Date Applicat No Kind Date JP 8234779 19960913 JP 9566853 Α Α 19950228 199647 B Priority Applications (No Type Date): JP 9566853 A 19950228 Patent Details: Patent No Kind Lan Pg Main IPC Filing Notes 9 G10K-015/04 JP 8234779 Α Music reproduction appts. for e.g. videoke -has image-reproduction unit equipped with several sets of reproduction appts. that performs changing of background drawing suitable to music information read by controller ...Abstract (Basic): The appts. (11) has a recording unit that records music information specified by an input unit (22). A lot of recording medium were recorded with image information that corresponds to music category for background drawing effect presentation. An image-reproduction unit equipped with several sets of reproduction appts. (11) is used for recording medium regeneration after a controller (17) reads the specified information... ... A reproduction unit (23) regenerates the music information read by the **controller** simultaneous with the image information reproduced by the image-reproduction unit ADVANTAGE - Enables changing of background drawing appropriate to reproduced music due to several sets of reproduction appts. Shortens time in reproducing background drawing and music requesting Title Terms: MUSIC; ... International Patent Class (Additional): G10H-001/00 G11B-027/34 H04N-005/93 Manual Codes (EPI/S-X): W04-J03 ...

... W04-X03A3

52/3,K/65 (Item 56 from file: 350) DIALOG(R)File 350:Derwent WPIX

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010890006 **Image available** WPI Acc No: 1996-386957/199639

XRPX Acc No: N96-326122

Multilingual television transmission system for dial-up television - has number of different language sound and text tracks which are transmitted in parallel or multiplexed with video frames with user selecting appropriate language with simultaneous recording of programmes

Patent Assignee: MALIK G S J (MALI-I)

Inventor: MALIK G S J

Number of Countries: 001 Number of Patents: 001

Patent Family:

Patent No Kind Date Applicat No Kind Date Week GB 2298544 A 19960904 GB 954342 A 19950303 199639 B

Priority Applications (No Type Date): GB 954342 A 19950303 Patent Details:

Patent No Kind Lan Pg Main IPC Filing Notes GB 2298544 A 14 H04N-005/60

... has number of different language sound and text tracks which are transmitted in parallel or multiplexed with video frames with user selecting appropriate language with simultaneous recording of programmes

- ...Abstract (Basic): The system includes at least one control channel for transmission of control data, with multilingual text channels and multilingual sound tracks synchronised with the picture frames in independent channels. The number of channels for control, sound and text can be varied, interchanged and altered temporarily and permanently on a real-time basis to accommodate different conditions. A dedicated channel is leased from a satellite television network, cable television network, mobile telephone network or optical cable network for the transmission of a specific programme...
- ...the current frames, with the user interacting with the television system through switches or remote **control**. The user chooses from a menu on the screen, with choices **stored** for subsequent use w.r.t. time, channel or programme...
- ...ADVANTAGE Allows use of connected networked system with shared system resources e.g. for users living in flats. Can be incorporated into dedicated IC board which is easily installed into existing equipment. Allows users to upgrade or change systems with IC board portable for use when travelling. Allows recording of programmes with appropriate language track...

... Title Terms: MULTIPLEX ;

International Patent Class (Main): H04N-005/60
International Patent Class (Additional): H04N-005/92
Manual Codes (EPI/S-X): T01-J08A ...

... W02-F06B5 ...

... W03-A03C1

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(Item 72 from file: 350)
52/3,K/81
DIALOG(R) File 350: Derwent WPIX
(c) 2005 Thomson Derwent. All rts. reserv.
            **Image available**
008226258
WPI Acc No: 1990-113259/199015
   Video recording system for VTR - includes several video regenerators
  having common primary controller to operate regeneration
  simultaneously NoAbstract Dwg 1/12
Patent Assignee: SONY CORP (SONY )
Number of Countries: 001 Number of Patents: 001
Patent Family:
Patent No
             Kind
                    Date
                            Applicat No
                                           Kind
                                                  Date
                                                           Week
JP 2065597
              Α
                  19900306 JP 88217737
                                           Α
                                                19880831 199015 B
Priority Applications (No Type Date): JP 88217737 A 19880831
   Video recording system for VTR...
...includes several video regenerators having common primary
  controller to operate regeneration
                                        simultaneously NoAbstract Dwg
  1/12
Title Terms: VIDEO ;
International Patent Class (Additional): G11B-015/02 ...
... H04N-013/00
Manual Codes (EPI/S-X): W04-B01 ...
... W04-B10 ...
... W04-F01 ...
... W04-K ...
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... W04-P01C

52/3,K/87 (Item 78 from file: 350)

DIALOG(R) File 350: Derwent WPIX

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007704909 **Image available** WPI Acc No: 1988-338841/198848

XRPX Acc No: N88-256893

Coupling of vertical synchronising signals for TV studio - using LAN

network for data transmission based upon video signals synchronised to clock signals

Patent Assignee: BTS BROADCAST TELEV (BTSB-N)

Inventor: GLAAB F; RITTER U; STURM R

Number of Countries: 003 Number of Patents: 004

Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
DE 3715595	A	19881124	DE 3715595	A	19870509	198848	В
FR 2615059	A	19881110	FR 884609	Α	19880407	198901	
US 4951142	A	19900821	US 88188420	Α	19880429	199036	
DE 3715595	С	19920213				199207	

Priority Applications (No Type Date): DE 3715595 A 19870509

Patent Details:

Patent No Kind Lan Pg Main IPC Filing Notes

DE 3715595 Α

Coupling of vertical synchronising signals for TV studio...

- ...using LAN network **for** data transmission based upon video signals synchronised to clock signals
- ... Abstract (Basic): A local area network (LAN) is used for communication between a number of control computers within a television studio. The system has a central processing command module (8), servo system for film transport (8), processor (10) and colour correction unit (11). Each of the units has an associated computer (12-16...
- ...Communication between the units is made over the LAN network which has receiver/transmitter units (1-5) connected by cable providing a serial data bus. Transmissions are synchronised by counting clock cycles...
- ... Abstract (Equivalent): A local area network communicator used to couple the units of a television studio system, such as a film scanning system. The system has a CPU (7), operator console (8), servis circuit (9) for film transport, a video processor (10) and colour correction unit + (11). The colour corrector unit is only intended to change values during the vertical frequency pulse intervals in order to avoid visible noise of the reproduction. This is achieved by counting the vertical synchronising signal clock pulses of the processor using a counter (19) and generating a reference signal. ADVANTAGE - Allows network units to be synchronised . (4pp)
- ... Abstract (Equivalent): In order to couple together vertical-frequency synchronization signals generated by a computer connected to an transmission system, the synchronization signals are generated by counting the clock pulses...
- ...A reference signal is transmitted to the computer or processor; the reference has a frequency which -is a whole-number fraction of the desired frequency. Upon receipt in the processor (16) of the reference signal, a counter (19) provided for counting of the clock pulses is preset. ADVANTAGE - Obviates need for supplementary

synchronisation signal corrections in broadcasting studio
installation .

...Title Terms: SYNCHRONISATION;
International Patent Class (Additional): H04L-007/00 ...

... H04N-005/07

Manual Codes (EPI/S-X): T01-H05 ...

... то1-но7 ...

... то1-к ...

... W04-M09 ...

... W04-N

52/3,K/89 (Item 80 from file: 350) DIALOG(R) File 350: Derwent WPIX (c) 2005 Thomson Derwent. All rts. reserv. 007557806 WPI Acc No: 1988-191738/198828 XRPX Acc No: N88-146641 Computer human interface for digital data processing - updates multiple pictures simultaneously and windows can be moved around on screen and sizes can be changes Patent Assignee: COMPUTER X INC (COMP-N); MOTOROLA INC (MOTI) Inventor: KOLNICK F C Number of Countries: 005 Number of Patents: 005 Patent Family: Patent No Kind Date Applicat No Kind Date Week EP 274087 Α 19880713 EP 87118487 Α 19871214 198828 US 5062060 Α 19911029 US 89355092 Α 19890517 199146 С CA 1297995 19920324 199218 US 5335323 Α 19940802 US 87620 19870105 Α 199430 US 91689113 Α 19910422 US 92982401 Α 19921127 US 5502839 Α 19960326 US 87619 Α 19870105 199618 US 89361738 Α 19890602 Priority Applications (No Type Date): US 87626 A 19870105; US 87619 A 19870105; US 87620 A 19870105; US 87625 A 19870105; US 89355092 A 19890517; US 91689113 A 19910422; US 92982401 A 19921127; US 89361738 A 19890602

Patent Details:

Patent No Kind Lan Pg Main IPC Filing Notes

EP 274087 A E 30

Designated States (Regional): DE FR GB

US 5335323 67 G06F-015/40 Cont of application US 87620 Α Cont of application US 91689113

US 5502839 Α 123 G06F-013/00 Cont of application US 87619

Computer human interface for digital data processing - ...

- ... updates multiple pictures simultaneously and windows can be moved around on screen and sizes can be changes
- ... Abstract (Basic): In the computer human interface an adjustable window enables the user to view an abstract device independent picture description of information: Each window can be sized independently regardless of applications running on them. The pictures are completely independent of each other. Multiple pictures (170,174) can be updated simultaneously and windows can be moved around on the screen and their sizes changed without the involvement of other windows and/or pictures .
- ...including windows, representing portions of any or all of the applications can be displayed and updated on the output device simultaneously and independently of one another. All human interface is performed through virtual input/output devices (186, 187
- ... Abstract (Equivalent): A virtual input interface in a data processing system, said interface comprising...
- ...means for accepting input from at least one physical device and for converting said physical device input into virtual input, said means

comprising a virtual input manager process responsive to said at least one physical input device for generating a picture, said picture comprising one or more picture elements, each picture element comprising a plurality of device -independent data structures in a predetermined, standard data format, at least one of said data structures comprising a plurality of different data fields each containing information describing said picture element; and...

- ...virtual input for performing processing operations upon said virtual input, said means comprising a console **manager** process for performing processing operations on said one or more **picture** elements...
- ...In a **computer** human interface an adjustable "window" enables the user to view a portion of an abstract, **device** -independent " **picture** " description of information. **More** than **one** window can be opened at a time. Each window can be sized independently of another...
- ...them. The human interface creates a separate "object" (represented by a process) for each active picture and for each active window. The pictures are completely independent of each other. That is, none is aware of the existence of any other, and any picture can be updated without reference to, and without affect upon, any other. The same is true of windows...
- ...represented by two objects, a window (distinguished by its frame title, icons, etc) and a picture which is (partially) visible within the boundaries of the windows frame. ADVANTAGE Multiple pictures can be up-dated simultaneously. Windows can be moved around screen and their sizes changed...

Title Terms: COMPUTER;

International Patent Class (Main): G06F-013/00 ...

... G06F-015/40

International Patent Class (Additional): G06F-003/03
Manual Codes (EPI/S-X): T01-C02B1 ...

... T01-J

(Item 84 from file: 350) 52/3,K/93 DIALOG(R) File 350: Derwent WPIX (c) 2005 Thomson Derwent. All rts. reserv. 004815642 WPI Acc No: 1986-318983/198648 XRPX Acc No: N86-238150 Simultaneous display of number of picture data method - producing display by storing each picture data in memory and reading them onto multi-screen Patent Assignee: ISS KK (ISSI-N); SATO N (SATO-I) Inventor: SATO N Number of Countries: 011 Number of Patents: 004 Patent Family: Patent No Kind Date Applicat No Kind Date 198648 WO 8606912 Α 19861120 WO 86JP238 Α 19860508 JP 61255188 Α 19861112 JP 8596075 Α 19850508 198652 EP 222920 Α 19870527 EP 86902910 Α 19860508 198721 CN 8605983 Α 19880323 198919 Priority Applications (No Type Date): JP 8596075 A 19850508 Patent Details: Patent No Kind Lan Pg Main IPC Filing Notes WO 8606912 A J 17 Designated States (National): KR US Designated States (Regional): CH DE FR GB IT NL EP 222920 Designated States (Regional): CH DE FR GB IT LI NL Simultaneous display of number of picture data method... ...producing display by storing each picture data in memory and reading them onto multi-screen ... Abstract (Basic): In a videotex communication network, picture data is divided into a number of data and stored in the memory of the systems main computers . Each picture data file is read from a terminal computer , which stores multiple of files and displays them at the same time onto a CRT display. For this purpose, a terminal is provided with a computer , an A- picture memory an interface a set of B- picture memories and a CRT display... ...When each picture file is received by the A-memory, it is processed and stored in one of B-memories. The stored data are displayed simultaneously on a screen... ... USE/ADVANTAGE - Promotional or educational purposes. Simultaneous display of various combinations of pictures is possible. (17pp Dwg.No.1/7)Title Terms: SIMULTANEOUS ; International Patent Class (Additional): H04M-011/06 H04N-001/23 H04N-007/17 Manual Codes (EPI/S-X): T01-J05 W02-F05 ...

... W04-W09

52/3,K/100 (Item 91 from file: 350)

DIALOG(R) File 350: Derwent WPIX

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001299136

WPI Acc No: 1975-J3053W/197533

Graphic display computer system - peripheral operating positions

repeat data contained in central memory and processor

Patent Assignee: WESTERN ELECTRIC CO INC (AMTT) Number of Countries: 001 Number of Patents: 001

Patent Family:

Patent No Kind Date Applicat No Kind Date Week NL 146619 B 19750715 197533 B

Priority Applications (No Type Date): US 67682280 A 19671113

Graphic display computer system...

...peripheral operating positions repeat data contained in central memory and processor

...Abstract (Basic): A computer set with graphic display having one or more local operating positions with a local compute and a memory for recording blocks of graphic and programme data together with a display unit for graphical display; and with a central computer in time multiplex connection with the local station. The memory (103, 107) of the central computer (101) retains data equivalent to that record at the peripheral stations (120), the equivalence being effected by identification signals assuring the same operation by the local computer (130) and the central computer (101) by a central process (102). Synchronisation in processing is maintained by a set of synchronising signals together with periodic updating signals to ensure that the graphic display at each operation position corresponds with the state of the central processor.

Title Terms: GRAPHIC;

International Patent Class (Additional): G06F-003/14

```
Set
         Items
                 Description
                 AUDIO? OR VOICE? OR SOUND? OR MUSIC? OR SONG? OR ACOUSTIC?
S1
        229031
              OR JUKEBOX?
S2
        329239
                 VIDEO? OR VTR OR VCR OR PHOTOGRAPH? OR GRAPHIC? OR PICTUR?
              OR PICTOR? OR STILL() IMAGE? OR MOVIE? OR (MOTION? OR MOVING) (-
              ) IMAGE?
S3
        103801
                 TV OR TELEVISION? OR MPEG OR JPEG
S4
         73375
                 DVD OR DVDS OR DIGITAL?() (CONTENT? OR DATA OR INFO OR INFO-
              RMATION?) OR DIGITAL?()(VIDEO OR VERSATIL?)()(DISC? OR DISK?)
S5
         29901
                 MULTIMEDIA? OR MULTI() MEDIA?
       1539714
S6
                 DEVICE? OR UNIT? ? OR MODULE? ? OR APPLIANCE? OR EQUIPMENT?
               OR SERVER?
S7
        483447
                 CONTROLLER? OR COMPUTER? OR CPU OR CPUS
S8
        258270
                 CENTRAL() PROCESS? OR PROCESSOR? OR MICRO() PROCESS? OR DATA-
              () PROCESS? OR MICROCOMPUTER? OR WORKSTATION? OR WORK() STATION?
S9
      1031280
                 CHIEF? OR MAIN OR MANAGER? OR MANAGING? OR MASTER? OR CENT-
              ER? OR CENTRAL? OR COMMAND
S10
      1174154
                 HUB OR HUBS OR PRIMARY OR PRINCIPAL OR CONTROLLER? OR CONT-
              ROLLING? OR CONTROL
                 MULTIP? OR MULTIT? OR SEVERAL? OR NUMEROUS? OR MORE(2W)ONE
$11
      1207450
              OR TWO(2W) MORE OR ASSEMBLY? OR ASSEMBLIE?
        397844
                 COLLECTION? OR NETWORK? OR LAN OR WAN OR LANS OR WANS OR I-
. S12
              NTERNET? OR ETHERNET? OR EXTRANET?
                 ONLINE? OR INTRANET? OR COMMUNICAT?()SYSTEM? OR WAP OR WAPS
S13
        526021
               OR LIBRAR? OR ARCHIV? OR VARIET?
S14
        600795
                 SYNCHRON? OR SYNCRON? OR COINCID? OR SIMULTAN? OR (RENDER?
              OR MAKE? OR MAKING OR MADE) () IDENTICAL? OR IDENTICALIZ? OR ID-
              ENTICALIS? OR RESYNCRON? OR RESYNCHRON?
                 ("SAME" OR IDENTIC? OR SIMILAR?)()TIME? ? OR SYNC?? OR SYN-
S15
        395174
              K?? OR CONTEMPORAN? OR CONCURREN? OR COOCCURR? OR CO()OCCUR?
S16
        282535
                 UPDAT? OR UP(2W)DATE OR RESET? OR REFRESH? OR RELOAD? OR R-
              ESTOR? OR RENEW? OR REENABL?
S17
        164717
                 PATCH? OR UPGRAD? OR FIXUP? OR REGENERAT? OR REPLENISH? OR
              REVITAL? OR REJUVENAT?
S18
        379262
                 DOWNLOAD? OR DOWN()LOAD? OR UPLOAD? OR UP()LOAD? OR INSTAL-
              L? OR (DOWN OR UP) () LINK? OR DOWNLINK? OR UPLINK?
                 RETRIEV? OR STORE? OR STORING? OR STORAG? OR RECORDING?
S19
        745995
S20
        175913
                 (DATA OR FILE? OR RECORD?) (3N) (TRANSFER? OR TRANSMI? OR OF-
              FLOAD? OR UNLOAD? OR FEED? OR FLOW?)
S21
           982
                 ARQPRO OR ARQ()PRO OR AUDIOREQUEST()PRO OR AUDIO()REQUEST(-
              ) PRO OR AMX OR REQUEST() (MULTIMEDIA OR MULTI() MEDIA)
S22
        370908
                 IC=(G06? OR H04N? OR H04L? OR G09B? OR G10H? OR G06T? OR H-
              04H? OR G11B? OR H04M?)
S23
         80616
                 ((S1(10N)S2) OR S3:S5)(10N)S6:S8
S24
           494
                 S21 AND S14:S15
S25
                 S24 AND S14:S15(7N)S16:S20
            32
S26
                 S23 AND S9:S10(5N)S6:S8 AND S11:S13(5N)S6:S8
         41673
S27
                 S26 AND S14:S15(7N)S16:S20
          7593
S28
          4498
                 S27 AND S16:S20(5N)(S1(10N)S2 OR S3:S5)
S29
           632
                 S28 AND S16:S17(5N)(S1(10N)S2 OR S3:S5)
S30
           552
                 S29 AND S18:S20(5N)(S1(10N)S2 OR S3:S5)
S31
           500
                 S30 AND S22
S32
            23
                 S29:S31 AND S14:S15/TI
S33
        752341
                 AD=2002:2005
S34
           366
                 S31 NOT S33
S35
           100
                 S34 AND ((S1 AND S2) OR (S3:S5))/TI
            55
                 S25 OR S32
S36
S37
           151
                 S35:S36
S38
           137
                 S37 NOT S33
S39
           137
                 IDPAT (sorted in duplicate/non-duplicate order)
```

? show files

File 348:EUROPEAN PATENTS 1978-2005/Jul W02

(c) 2005 European Patent Office File 349:PCT FULLTEXT 1979-2005/UB=20050714,UT=20050707

(c) 2005 WIPO/Univentio

```
Set
        Items
                Description
S1
                AUDIO? OR VOICE? OR SOUND? OR MUSIC? OR SONG? OR ACOUSTIC?
      1377457
             OR JUKEBOX?
S2
                VIDEO? OR VTR OR VCR OR PHOTOGRAPH? OR GRAPHIC? OR PICTUR?
      1460234
             OR PICTOR? OR STILL() IMAGE? OR MOVIE? OR (MOTION? OR MOVING) (-
             ) IMAGE?
                TV OR TELEVISION? OR MPEG OR JPEG
S3
       388856
                DVD OR DVDS OR DIGITAL?()(CONTENT? OR DATA OR INFO OR INFO-
S4
        45276
             RMATION?) OR DIGITAL?()(VIDEO OR VERSATIL?)()(DISC? OR DISK? -
             OR RECORDER?) OR DVR OR DVRS
S5
       179748
                MULTIMEDIA? OR MULTI() MEDIA?
S6
      6550796
                DEVICE? OR UNIT? ? OR MODULE? ? OR APPLIANCE? OR EQUIPMENT?
              OR SERVER? OR TERMINAL? ? OR STATION? ?
S7
      4683833
                CONTROLLER? OR COMPUTER? OR CPU OR CPUS
S8
                CENTRAL() PROCESS? OR PROCESSOR? OR MICRO() PROCESS? OR DATA-
       884393
             () PROCESS? OR MICROCOMPUTER? OR WORKSTATION? OR WORK() STATION?
S9
                CHIEF? OR MAIN OR MANAGER? OR MANAGING? OR MASTER? OR CENT-
      6000364
             ER? OR CENTRAL? OR COMMAND OR BASE
               HUB OR HUBS OR PRIMARY OR PRINCIPAL OR CONTROLLER? OR CONT-
S10
      7018716
             ROLLING? OR CONTROL
S11
      5393958
                MULTIP? OR MULTIT? OR SEVERAL? OR NUMEROUS? OR MORE(2W)ONE
             OR TWO(2W) MORE OR ASSEMBLY? OR ASSEMBLIE?
      2881600
                COLLECTION? OR NETWORK? OR LAN OR WAN OR LANS OR WANS OR I-
S12
             NTERNET? OR ETHERNET? OR EXTRANET?
S13
      1840050
                ONLINE? OR INTRANET? OR COMMUNICAT?()SYSTEM? OR WAP OR WAPS
              OR LIBRAR? OR ARCHIV? OR VARIET?
S14
      1364387
                SYNCHRON? OR SYNCRON? OR COINCID? OR SIMULTAN? OR (RENDER?
             OR MAKE? OR MAKING OR MADE) () IDENTICAL? OR IDENTICALIZ? OR ID-
             ENTICALIS? OR RESYNCRON? OR RESYNCHRON?
                ("SAME" OR IDENTIC? OR SIMILAR?)()TIME? ? OR SYNC?? OR SYN-
S15
       434214
             K?? OR CONTEMPORAN? OR CONCURREN? OR COOCCURR? OR CO()OCCUR?
S16
      1534157
                UPDAT? OR UP(2W)DATE OR RESET? OR REFRESH? OR RELOAD? OR R-
             ESTOR? OR RENEW? OR REENABL? OR EDIT?? OR EDITING
S17
       578209
                PATCH? OR UPGRAD? OR FIXUP? OR REGENERAT? OR REPLENISH? OR
             REVITAL? OR REJUVENAT?
S18
       578756
                DOWNLOAD? OR DOWN()LOAD? OR UPLOAD? OR UP()LOAD? OR INSTAL-
             L? OR (DOWN OR UP) () LINK? OR DOWNLINK? OR UPLINK?
S19
      1918872
                RETRIEV? OR STORE? OR STORING? OR STORAG? OR RECORDING?
S20
       275963
                (DATA OR FILE? OR RECORD?) (3N) (TRANSFER? OR TRANSMI? OR OF-
             FLOAD? OR UNLOAD? OR FEED? OR FLOW?)
S21
          740
                ARQPRO OR ARQ()PRO OR AUDIOREQUEST()PRO OR AUDIO()REQUEST(-
             ) PRO OR AMX OR REQUEST() (MULTIMEDIA OR MULTI() MEDIA)
S22
           14
                S21 AND S14:S15.
S23
       632905
                (S1(10N)S2) OR S3:S5
                S23 AND S6:S8
S24
       248259
                S24 AND S14:S15
S25
        17925
         1768
                S25 AND S16:S20(7N)S14:S15
S26
S27
          221
                S26 AND S16:S17 AND S18:S20
S28
          500
                S26 AND S9:S10 AND S11:S13
S29
                S27 AND S28
          67
S30
          654
                S27:S28
S31
          35
                S30 AND S16:S17(7N)S14:S15 AND S18:S20(7N)S14:S15
S32
          102
                S30 AND S9:S10(7N)S6:S8 AND S11:S13(7N)S6:S8
S33
          196
                S22 OR S29 OR S31 OR S32
S34
          162
                S33 AND PY<2002
S35
          135
                RD (unique items)
? show files
       2:INSPEC 1969-2005/Jul W2
File
         (c) 2005 Institution of Electrical Engineers
File
       6:NTIS 1964-2005/Jul W2
         (c) 2005 NTIS, Intl Cpyrght All Rights Res
```

File 8:Ei Compendex(R) 1970-2005/Jul W2

(c) 2005 Elsevier Eng. Info. Inc.
34:SciSearch(R) Cited Ref Sci 1990-2005/Jul W3

(c) 2005 Inst for Sci Info

File 35: Dissertation Abs Online 1861-2005/Jun

(c) 2005 ProQuest Info&Learning

File 65:Inside Conferences 1993-2005/Jul W3

(c) 2005 BLDSC all rts. reserv.

File 94:JICST-EPlus 1985-2005/May W5

(c) 2005 Japan Science and Tech Corp(JST)

File 99:Wilson Appl. Sci & Tech Abs 1983-2005/Jun

(c) 2005 The HW Wilson Co.

File 111:TGG Natl.Newspaper Index(SM) 1979-2005/Jul 21

(c) 2005 The Gale Group

File 144: Pascal 1973-2005/Jul W2

(c) 2005 INIST/CNRS

File 256:TecInfoSource 82-2005/Jun

(c) 2005 Info. Sources Inc

?

File

```
35/3, K/6
             (Item 6 from file: 2)
DIALOG(R)File
               2:INSPEC
(c) 2005 Institution of Electrical Engineers. All rts. reserv.
6288637
         INSPEC Abstract Number: C1999-08-6160M-008
  Title:
          Synchronous
                          control
                                    for
                                         retrieval
                                                    of data with Java in
distributed multimedia databases
  Author(s): Wada, M.; Komatsu, N.; Komiya, K.; Ikeda, H.
  Author Affiliation: Atsugi Res. Centre, Telecommun. Adv. Organ. of Japan,
Kanagawa, Japan
  Conference Title: ICCT'98. 1998 International Conference on Communication
Technology. Proceedings (IEEE Cat. No.98EX243)
                                                 Part vol.1
                                                                 p.557-63
  Editor(s): Chunpei, X.
  Publisher: Publising House of Constr. Mater, Beijing, China
  Publication Date: 1998 Country of Publication: China
                                                          2 vol.787+832
  ISBN: 7 80090 827 5
                        Material Identity Number: XX-1998-03564
  Conference Title: ICCT'98. 1998 International Conference on Communication
Technology. Proceedings
  Conference Sponsor: China Inst Commun. (CIC); Chinese Inst. Electron.
(CIE); IEEE Commun. Soc. (IEEE COMSOC)
  Conference Date: 22-24 Oct. 1998
                                    Conference Location: Beijing, China
  Language: English
  Subfile: C
  Copyright 1999, IEE
          Synchronous
                                          retrieval
                                                     of data with Java in
  Title:
                          control
                                    for
distributed multimedia databases
  Abstract: Owing to advances in networking, infrastructures necessary
for the use of distributed multimedia databases are being realized, and
they establish the environment to set up practical multimedia databases.
This paper points out the necessities of synchronous
                                                         control at the
terminals
            used for
                        retrieving data from distributed
                                                              multimedia
databases, and also points out the usefulness of Java in the synchronous
            of the data to be displayed, from the viewpoint of language
   control
specifications. With a Java-based experimental system, this paper discusses
the effect of multithreading on the system throughput viewing from these
           , and the synchronous control of the content data on the
displays. Finally, this paper shows that Java is optimum for synchronous
control of the retrieval
                            terminal . We also show that the state of the
synchronous
              control can be simply verified, in the form which the eyes
can see, by the trace...
  ...Descriptors: multimedia databases
  Identifiers: synchronous
                             control ; ...
...distributed multimedia databases...
... networking ; ...
... multithreading ;
```

1998

35/3,K/7 (Item 7 from file: 2) DIALOG(R) File 2: INSPEC (c) 2005 Institution of Electrical Engineers. All rts. reserv. INSPEC Abstract Number: B1999-07-6150M-070, C1999-07-5640-054 Title: TUTMAC: a medium access control protocol for a new multimedia wireless local area network Author(s): Hannikainen, M.; Knuutila, J.; Letonsaari, A.; Hamalainen, T.; Jokela, J.; Ala-Laurila, J.; Saarinen, J. Author Affiliation: Signal Process. Lab., Tampere Univ. of Technol., Finland Conference Title: Ninth IEEE International Symposium on Personal, Indoor and Mobile Radio Communications (Cat. No.98TH8361) Part vol.2 vol.2 Publisher: IEEE, New York, NY, USA Publication Date: 1998 Country of Publication: USA 3 vol. 1574 pp. ISBN: 0 7803 4872 9 Material Identity Number: XX-1998-03094 U.S. Copyright Clearance Center Code: 0 7803 4872 9/98/\$10.00 Title: Proceedings of Ninth International Symposium on Conference Personal, Indoor, and Mobile Radio Communications (PIMRC'98) Conference Sponsor: Worcester Polytech. Inst.; Nokia; Bell Atlantic Mobile; CWINS; Analog Devices; IEEE; IEEE Commun. Soc.; IEE; IEICE; GTE Lab Conference Date: 8-11 Sept. 1998 Conference Location: Boston, MA, USA Language: English Subfile: B C Copyright 1999, IEE Title: TUTMAC: a medium access control protocol for a new multimedia wireless local area network Abstract: This paper presents a medium access control (MAC) protocol called TUTMAC for a new wireless local area network (TUTWLAN). The design objective has been to develop a simple, multimedia service capable that provides sufficient medium utilisation efficiency and guarantees QoS (quality of service) parameters. The developed system centralised (base station controlled) architecture. A limited number of portable stations can be associated with the same base station , i.e. in the same TUTWLAN cell. TUTMAC is connection oriented: the bandwidth is allocated deploying constant bit-rate TDMA based data channels that are reserved by exchanging short control messages. The connection parameters can be dynamically altered during the data exchange session. Currently, a TUTWLAN prototype is being developed comprising both TUTMAC software and platform hardware modules. The prototype will support up to eight simultaneous data - transfer connections each having 64 to 512 kbit/s data transmission bandwidth. ...Descriptors: multimedia communication... ...time division multiple access... ...wireless LAN Identifiers: medium access control protocol... ... multimedia wireless local area network; multimedia service capable protocol... ... centralised network architecture... ... base station controlled network architecture...

...portable stations; ...

... control messages

```
35/3,K/11
              (Item 11 from file: 2)
               2: INSPEC
DIALOG(R)File
(c) 2005 Institution of Electrical Engineers. All rts. reserv.
         INSPEC Abstract Number: B9708-6210R-017, C9708-6130M-026
  Title: Multimedia platforms and applications integrating groupware with
video-on-demand
 Author(s): Fukuoka, H.; Mizuno, H.; Kawasaki, S.
 Author Affiliation: C&C Res. Labs., NEC Corp., Japan
  Journal: NEC Research and Development
                                          vol.38, no.2
                                                         p.262-9
  Publisher: NEC Creative,
  Publication Date: April 1997 Country of Publication: Japan
 CODEN: NECRAU ISSN: 0547-051X
 SICI: 0547-051X(199704)38:2L.262:MPAI;1-W
 Material Identity Number: N043-97003
 Language: English
 Subfile: B C
 Copyright 1997, IEE
 Title: Multimedia platforms and applications integrating groupware with
video-on-demand
 Abstract:
             Multimedia
                          platforms and applications integrating groupware
with video-on-demand are described. The integrated platform is achieved by
association of a groupware server with a video-on-demand server using a
Video Service Bridge (VSB). The platform enables application developers to
        multimedia
                     application systems supporting both groupware and
video-on-demand functions, and provides both real-time and stored
            synchronized with audio to group users simultaneously . A
naturally
collaborative automobile sales support system and a group hypermedia
navigational system developed on the...
... platform are interesting examples showing the platform's possibilities.
Using these systems, group users can simultaneously share and operate
video images retrieved from video servers .
  ... Descriptors: interactive television; ...
... multimedia communication...
... multimedia computing...
... network
            servers ;
 Identifiers: multimedia platforms...
... multimedia -on-demand...
... multimedia groupware...
...groupware server; ...
... multimedia application systems...
...naturally synchronized; ...
...video servers; ...
... multipoint control
                         unit ;
  1997
```

```
35/3,K/12
               (Item 12 from file: 2)
DIALOG(R) File
               2:INSPEC
(c) 2005 Institution of Electrical Engineers. All rts. reserv.
          INSPEC Abstract Number: B9612-6210R-012, C9612-6130M-019
 Title: On storage server issues for multimedia -on-demand systems
 Author(s): Ngoh, L.H.; Pan, H.; Reddy, V.
  Author Affiliation: Inst. of Syst. Sci., Nat. Univ. of Singapore,
Singapore
  Conference Title: Multimedia Modeling. Towards Information Superhighway
p.393-409
  Editor(s): Chua, T.S.; Pung, H.K.; Lunii, T.L.
  Publisher: World Scientific, Singapore
  Publication Date: 1995 Country of Publication: Singapore
  ISBN: 981 02 2502 4
                          Material Identity Number: XX95-02107
  Conference Title: Proceedings of International Conference on Multimedia
Modeling
  Conference Date: 14-17 Nov. 1995 Conference Location: Singapore
 Language: English
 Subfile: B C
 Copyright 1996, IEE
 Title: On storage server issues for multimedia -on-demand systems
Abstract: In this paper, the various research and design issues of a storage server in the context of a multimedia -on-demand (MOD) system
are explored. Using the research prototype currently being developed by the
... of various disk systems which can be used to form the basis of the
storage server . Next we present a producer-consumer based dynamic disk
scheduling scheme to retrieve
                                     multiple data streams simultaneously
and deposit the data in the buffer memory of the MOD server for delivery
to the respective clients. We show experimentally that the dynamic nature
of the...
\ldots algorithms which have been proposed elsewhere. We further demonstrate
how by using the concepts of "multimedia capacity region" (MCR) the
QoS-guaranteed service "capacity" of the storage server can be determined
for admission control purposes. Finally the overall design of a typical
MOD storage
             server
                       and the various multimedia information browsing
techniques are discussed.
  ... Descriptors: interactive television; ...
... multimedia communication...
... multimedia computing...
... network
             servers ; ...
...telecommunication congestion control;
 Identifiers: storage server issues...
... multimedia -on-demand systems...
... multiple data streams...
... multimedia capacity region...
...admission control purposes...
```

... multimedia information browsing techniques 1995

```
(Item 14 from file: 2)
35/3,K/14
DIALOG(R) File 2: INSPEC
(c) 2005 Institution of Electrical Engineers. All rts. reserv.
          INSPEC Abstract Number: B9606-6210R-088, C9606-3370Z-003
  Title: Performance measurement of a stored
                                                    media synchronization
mechanism: graceful recovery scheme
  Author(s): Ishibashi, Y.; Minami, E.; Tasaka, S.
  Author Affiliation: Dept. of Electr. & Comput. Eng., Nagoya Inst. of
Technol., Japan
  Journal: IEICE Transactions on Communications
                                                     vol.E79-B, no.3
399-411
  Publisher: Inst. Electron. Inf. & Commun. Eng,
  Publication Date: March 1996 Country of Publication: Japan
  CODEN: ITCMEZ ISSN: 0916-8516
  SICI: 0916-8516(199603)E79B:3L.399:PMSM;1-L
  Material Identity Number: P711-96005
  Language: English
  Subfile: B C
  Copyright 1996, IEE
  Title: Performance measurement of a stored
                                                    media synchronization
 mechanism: graceful recovery scheme
 Abstract: This paper
                           reports
                                     experimental results of a media
 synchronization mechanism which was proposed by the authors, focusing on
the graceful recovery scheme. The proposed method consists of intra-stream
       inter-stream
                        synchronization
                                          mechanisms. The
synchronization
                       control
                                 is performed
                                                  after the intra-stream
 synchronization
                    control over each media unit (MU) such as a video
frame. Then, whether the intra-stream synchronization is still maintained
or not is checked. In the experimental system, video and voice stored
in a source workstation are transferred to a destination workstation
{\tt via} an FDDI {\tt network} , and then they are {\tt synchronized} and outputted at
the destination (i.e. lip- synchronisation ). At the transmission of each MU, we simulate network delay jitters by generating a pseudo-delay which
is exponentially distributed. Using the system, we...
... and average MU rate or by subjective assessment. Furthermore, we
demonstrate that the intra-stream synchronization control for each
stream in addition to the inter-stream control is necessary for high
quality synchronization .
  ...Descriptors: multimedia communication...
... synchronisation ; ...
...telecommunication control;
  ...Identifiers: media synchronization mechanism...
...intra-stream synchronization; ...
...inter-stream synchronization; ...
... control ; ...
...media unit; ...
... multimedia traffic...
...digital network; ...
... network delay jitter
```

```
35/3,K/17
             (Item 17 from file: 2)
DIALOG(R)File
               2:INSPEC
(c) 2005 Institution of Electrical Engineers. All rts. reserv.
         INSPEC Abstract Number: C9510-6160S-007
Title: Content-based inter-media synchronization
  Author(s): Dong-Young Oh; SampathKumar, S.; Rangan, P.V.
  Author Affiliation: Dept. of Comput. Sci. & Eng., California Univ., San
Diego, La Jolla, CA, USA
  Journal: Proceedings of the SPIE - The International Society for Optical
Engineering Conference Title: Proc. SPIE - Int. Soc. Opt. Eng. (USA)
vol.2417
           p.202-14
  Publication Date: 1995 Country of Publication: USA
  CODEN: PSISDG ISSN: 0277-786X
  U.S. Copyright Clearance Center Code: 0 8194 1764 5/95/$6.00
  Conference Title: Multimedia Computing and Networking 1995
  Conference Sponsor: SPIE; Soc. Imaging Sci. & Technol
 Conference Date: 6-8 Feb. 1995
                                Conference Location: San Jose, CA, USA
  Language: English
  Subfile: C
  Copyright 1995, IEE
Title: Content-based inter-media synchronization
  Abstract: Intermedia
                       synchronization methods developed until now have
been based on syntactic timestamping of video frames and audio samples.
These methods are not fully appropriate for the synchronization of
            objects which may have to be accessed individually by their
multimedia
contents, e.g. content based data retrieval . We propose a content based
             synchronization scheme in which a media stream is viewed as
hierarchical composition of smaller objects which are logically structured
based on their contents, and the synchronization is achieved by deriving
temporal relations among logical units of media object. Content based
                   offers several advantages such as, elimination of the
synchronization
need for time stamping, freedom from limitations of
synchronization of independently captured media objects in video editing
, and compensation for inherent asynchronies in capture times of video
and audio .
 Descriptors: information retrieval; ...
... multimedia computing...
... synchronisation
 Identifiers: content based intermedia synchronization; ...
... content-based inter-media synchronization ; ...
...intermedia synchronization methods...
... multimedia objects...
...content based data retrieval ; ...
...content based multimedia synchronization scheme...
...logical units; ...
...video editing;
   1995
```

```
35/3,K/20
              (Item 20 from file: 2)
DIALOG(R)File
              2:INSPEC
(c) 2005 Institution of Electrical Engineers. All rts. reserv.
         INSPEC Abstract Number: B9401-6210L-107, C9401-3350-011
Title: Multimedia -integrated real-time control systems
 Author(s): Guha, A.; Agrawal, M.B.; Rundquist, R.R.
 Author Affiliation: Honeywell Sensor & System Dev. Center, Minneapolis,
MN, USA
                      Proceedings of the IEEE Workshop on Real-Time
 Conference
              Title:
Applications (Cat.No.93TH0559-5)
                                 p.29-33
  Publisher: IEEE Comput. Soc. Press, Los Almitos, CA, USA
Publication Date: 1993 Country of Publication: USA
 ISBN: 0 8186 4130 4
 U.S. Copyright Clearance Center Code: 0 8186 4130 4/93/$03.00
 Conference Sponsor: IEEE
 Conference Date: 13-14 May 1993 Conference Location: New York, NY, USA
 Language: English
 Subfile: B C
 Title: Multimedia -integrated real-time control systems
 Abstract:
            Multimedia applications are becoming pervasive and are
expected to be used in advanced process control systems where image data
is related to higher order material qualities. The authors have analyzed
real-time control applications and their needs. A necessary component to
support such a distributed multimedia integrated control system is the
need for network services that support both the real-time needs of
control as well as the control traffic. The analysis shows that the
          network services must include support for network scheduling
for multilevel priority traffic and for synchronization of remote data
transmissions
              and stream multimedia traffic. They propose an
asynchronous transfer mode (ATM)-based network architecture that uses a
new real-time control protocol to provide these services.
 ...Descriptors: computer networks; ...
... multimedia systems...
...process computer
                      control ; ...
... synchronisation
 Identifiers: process control systems...
...real-time control ; ...
...distributed multimedia integrated control system...
... network services...
... control traffic...
... network scheduling...
... synchronization ; ...
...stream multimedia traffic
  1993
```

(Item 21 from file: 2) 35/3,K/21 DIALOG(R) File 2: INSPEC (c) 2005 Institution of Electrical Engineers. All rts. reserv. INSPEC Abstract Number: B9305-6210L-003, C9305-5620-001 Title: Techniques for multimedia synchronization in network file systems Author(s): Rangan, P.V.; Ramanathan, S.; Vin, H.M.; Kaeppner, T. Author Affiliation: Dept. of Comput. Sci. & Eng., California Univ., San Diego, La Jolla, CA, USA Journal: Computer Communications vol.16, no.3 p.168-76 Publication Date: March 1993 Country of Publication: UK CODEN: COCOD7 ISSN: 0140-3664 U.S. Copyright Clearance Center Code: 0140-3664/93/030168-09\$3.00 Language: English Subfile: B C Title: Techniques for multimedia synchronization in network file systems Abstract: One of the unique features that distinguishes digital multimedia from traditional computer data is the presence of multiple media streams, whose display must proceed in a mutually synchronized manner. The design of techniques for synchronization of multimedia data at the time of storage , and retrieval from network file servers is the subject matter of this paper. The authors present algorithms by which a file server can create a relative time system and synchronize media units transmitted by different sources on a network to construct a multimedia object. These algorithms stay robust in the absence of global clocks, in the presence of... ... jitter and generation rate mismatches. The authors develop a feedback technique by which the file server can detect asynchronies in display devices during retrieval of multimedia objects, and even restore deleting or duplicating media synchrony by units destined for asynchronous destinations. They then present strategies by which the file server can actually predict the time in future when the asynchrony of a device is expected to exceed the permitted bound, and take gradual preventive action to nullify the asynchrony in advance. These algorithms can be generalized to heterogeneous multimedia networks in which there may be variations in sizes of media units generated, differences in network locations of sources and destinations, etc. Descriptors: file servers ; multimedia systems...

synchronization; ...

... synchronisation

1993

Identifiers: multimedia

...network file servers ;

...mutually synchronized manner...

```
DIALOG(R) File
                2:INSPEC
(c) 2005 Institution of Electrical Engineers. All rts. reserv.
           INSPEC Abstract Number: B9202-6450D-008, C9202-6160Z-029
 Title: Designing file systems for digital video and audio
  Author(s): Venkat Rangan, P.; Vin, H.M.
  Author Affiliation: Dept. of Comput. Sci. & Eng., California Univ., San
Diego, La Jolla, CA, USA
  Journal: Operating Systems Review
                                     vol.25, no.5
                                                       p.81-94
  Publication Date: 1991 Country of Publication: USA
  CODEN: OSRED8 ISSN: 0163-5980
  U.S. Copyright Clearance Center Code: 0163-5980/91/0009-0081$1.50
  Conference
               Title:
                        Thirteenth
                                    ACM Symposium on Operating Systems
Principles
  Conference Sponsor: ACM
  Conference Date: 13-16 Oct. 1991
                                        Conference Location: Pacific Grove,
CA, USA
  Language: English
  Subfile: B C
 Title: Designing file systems for digital video and audio
  Abstract: The unique requirements are given, of a multimedia file
system such as continuous storage and retrieval of media, maintenance
     synchronization
                      between multiple
                                           media streams, and efficient
manipulation of huge media objects. The authors present a model that
relates disk and device
                            characteristics to the recording rate and
        storage
                 granularity and scattering parameters that guarantee
continuous access. In order for the file system to support multiple
concurrent requests, they develop admission control algorithms for
determining whether a new request can be accepted without violating the
real-time...
... a strand as an immutable sequence of continuously recorded media
samples, and then present a multimedia rope abstraction which is a
 collection of individual media strands tied together by synchronization
information. They devise operations for efficient manipulation of multi-stranded ropes, and develop an algorithm for maintaining the
scattering parameter during
                                editing so as to guarantee continuous
playback of edited ropes.
  ...Descriptors: data communication
                                        systems; ...
...information retrieval systems...
... multimedia systems
  ...Identifiers: multimedia file system...
...continuous storage; ...
... synchronization ; ...
... multiple media streams...
... device characteristics...
... recording rate...
... storage granularity...
```

35/3,K/23

... multiple

concurrent requests...

(Item 23 from file: 2)

- \dots admission control algorithms \dots
- ... multimedia rope abstraction...
- ... synchronization information 1991

(Item 28 from file: 2) 35/3,K/28 DIALOG(R) File 2: INSPEC (c) 2005 Institution of Electrical Engineers. All rts. reserv. INSPEC Abstract Number: C87048501 Title: An editing method of synchronized multimedia data for a communication terminal Author(s): Hayashi, Y.; Tanigawa, H.; Nakane, K.; Sakai, Y. Author Affiliation: NTT Electr. Commun. Labs., Yokosuka, Japan Journal: Transactions of the Institute of Electronics, Information and Communication Engineers B vol.J70B, no.2 p.214-21 Publication Date: Feb. 1987 Country of Publication: Japan CODEN: DJTBEU ISSN: 0373-6105 Language: Japanese Subfile: C Title: An method of editing synchronized multimedia data for a communication terminal Abstract: Synchronized multimedia storage service provides telecommunication with such media as document, voice and drawing/writing. For realizing this service an editing function for input data is very essential. The authors propose an editing method for synchronized multimedia data as follows. (1) A segmentation method to make editing (2) Efficient voice data retrieval method using the time correlation between media (3) Data elimination and insertion method which does not lose the synchronized correction between multimedia data and which minimizes the unnaturalness after editing . Descriptors: computer graphics... ... synchronisation ;text editing; Identifiers: computer graphics... ... editing method... ... synchronized multimedia data... ...communication terminal; ...

... multimedia storage service...

... synchronized correction

1987

35/3,K/68 (Item 13 from file: 8)
DIALOG(R)File 8:Ei Compendex(R)

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04745166 E.I. No: EIP97073721768

Title: Client based synchronization control of coded data streams

Author: Daami, Mourad; Georganas, Nicolas D.

Corporate Source: Univ of Ottawa, Ottawa, Ont, Can

Conference Title: Proceedings of the 1997 IEEE International Conference on Multimedia Computing and Systems, ICMCS

Conference Location: Ottawa, Ont, Can Conference Date: 19970603-19970606

E.I. Conference No.: 46571

Source: International Conference on Multimedia Computing and Systems-Proceedings 1997. IEEE, Los Alamitos, CA, USA. p 387-394

Publication Year: 1997

CODEN: 002114 Language: English

Title: Client based synchronization control of coded data streams
Abstract: In a multimedia news on demand application, the delivery of
multiple streams of data over a network will introduce inevitable delays
and delay variations that disrupt both inter- and intra- media
synchronization. Therefore, a complete stream synchronization protocol
must be specified and tested to ensure proper rendering of the multimedia
presentation at the client. In such a protocol, special treatment should be
considered for time...

...presence of a hardware/software decoding entity at the client. We propose a client based **control** scheme using buffer occupancy as its **main** parameter. The **control** scheme uses time contraction and expansion concepts to: avoid data overflow or underflow conditions and enforce intra-media **synchrony** of the data stream. We refer to such a **control** mechanism as the predecoder **synchronization controller**. We consider both motion **JPEG** and **MPEG** video bit streams and discuss the implementation and architectural constraints encountered. (Author abstract) 14 Refs.

Descriptors: *Dat a processing; Synchronization; Computer networks; Network protocols; Computer software; Buffer storage; Decoding; Constraint theory; Distributed computer systems

Identifiers: Stream synchronization protocols; Coded data streams

35/3,K/72 (Item 17 from file: 8)

DIALOG(R)File 8:Ei Compendex(R)

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04623823 E.I. No: EIP97023519768

Title: Synchronized continuous media playback through the World Wide Web

Author: Mayer-Patel, Ketan; Simpson, David; Wu, David; Rowe, Lawrence A. Corporate Source: Univ of California at. Berkeley, Berkeley, CA, USA Conference Title: Proceedings of the 1996 4th ACM International Multimedia Conference

Conference Location: Boston, MA, USA Conference Date: 19961118-19961122 E.I. Conference No.: 45965

Source: Proceedings of the ACM International Multimedia Conference & Exhibition 1996.. p 435-436

Publication Year: 1996

CODEN: 002179 Language: English

Title: Synchronized continuous media playback through the World Wide Web

...Abstract: with a World Wide Web browser to access remotely stored continuous media data (i.e., video and audio) and provide synchronized playback of multiple media streams. The cmplayer communicates with a server process also written with CMT to stream media data across the network using adaptive control to compensate for limited network bandwidth, server utilization, and client CPU resources. A simple script format is used to indicate the location of each piece of media data (i.e., hostname, port number and the filename) and specify source synchronization between media streams. Multiple video and audio streams can be specified. In addition, scrolling text streams and streams of Tcl commands can be integrated as stream types. A stream can be stored in multiple media data files distributed on different servers. Cmplayer script files are ASCII text and are typically less than 10 lines long. Cmplayer...

Descriptors: *Information retrieval systems; Distributed database systems; Computer networks; Bandwidth; Synchronization; Adaptive control systems; Interactive computer systems; Computer aided software engineering

35/3,K/75 (Item 20 from file: 8)

DIALOG(R)File 8:Ei Compendex(R)

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04254908 E.I. No: EIP95092863272

Title: Media synchronization mechanism for a distributed multimedia system with interactive control

Author: Ohno, Ryuichi; Aida, Hitoshi; Saito, Tadao Corporate Source: Hitachi Corp, Kokubunji-shi, Jpn

Source: IEICE Transactions on Communications v E78-B n 7 Jul 1995. p 980-986

Publication Year: 1995

CODEN: ITRCEC ISSN: 0916-8516

Language: English

Title: Media synchronization mechanism for a distributed multimedia system with interactive control

Abstract: **Synchronization** of media streams is recognized as an important requirement not only in media retrieval such...

...but also in groupware such as a remote conferencing system. In a remote conferencing system, **synchronization** is more complicated because Live Media Streams (LMS) such as the live raw voice of...

...consideration as well as Retrieved Media Streams (RMS) such as media streams retrieved from video equipment. In this paper, we propose a mechanism to synchronize RMSs and LMSs in a remote conferencing system DMSIC (Distributed Multimedia System with Interactive Control) which has been implemented on UNIX workstations connected by Ethernet. In this mechanism, synchronization among RMSs (we call it R&R synchronization) is kept by maintaining the Current Presentation Positions (CPP) on Media Buffers (MB) close to the Ideal Presentation Position (IPP). Synchronization among RMSs and LMSs (we call it R&L synchronization) is kept by adjusting the IPPs among multiple nodes. We have implemented the synchronization mechanism in DMSIC to confirm the effectiveness of it. (Author abstract) 11 Refs.

Descriptors: *Distributed database systems; Synchronization; Information retrieval systems; Video telephone equipment; Education computing; UNIX; Computer workstations; Computer networks; Teleconferencing; Information services

Identifiers: Multimedia synchronization; Ideal presentation position; Remote conferencing systems; Live media streams; Retrieved media streams; Distributed multimedia system with interactive control; Ethernet; Current presentation position; Media buffers

35/3,K/80 (Item 25 from file: 8)

DIALOG(R)File 8:Ei Compendex(R)

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04062715 E.I. No: EIP95022558579

Title: Temporal synchronization support for distributed multimedia information systems

Author: Lu, G.J.; Pung, H.K.; Chua, T.S.; Chan, S.F.

Corporate Source: Natl Univ of Singapore, Singapore, Singapore Source: Computer Communications v 17 n 12 Dec 1994. p 852-862

Publication Year: 1994

CODEN: COCOD7 ISSN: 0140-3664

Language: English

Title: Temporal synchronization support for distributed multimedia information systems

Abstract: A **synchronization** scheme that meets the four media **synchronization** requirements in DMIS is proposed. In this scheme, the media relationships are specified with the...

...script language from which the presentation schedule is generated. The presentation schedule is maintained by **controlling** the request times of data transfer for various media streams and by providing appropriate buffers...

...general DMISs where the inter-media relationships are complex and the data is stored in **more** than **one server** in the **network**. The scheme was tested on an **Ethernet** -Unix platform and has proved to be reliable. 26 Refs.

Descriptors: *Distributed computer systems; Synchronization; User interfaces; Interconnection networks; Stochastic control systems; Data transfer; UNIX; Interactive computer systems

Identifiers: Distributed ${\tt multimedia}$ information systems; Stochastic ${\tt network}$; ${\tt Ethernet}$ Unix platform

35/3,K/81 (Item 26 from file: 8)
DIALOG(R)File 8:Ei Compendex(R)
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03700129 E.I. No: EIP93091068274

Title: MMV- synchronizing multimedia documents: an extension of CDA for synchronization and presentation of multimedia documents

Author: Herzner, Wolfgang; Kummer, Matthias

Corporate Source: Forschungszentrum Seibersdorf, Seibersdorf, Austria Source: Computers & Graphics (Pergamon) v 17 n 3 May-Jun 1993. p 219-228

Publication Year: 1993

CODEN: COGRD2 ISSN: 0097-8493

Language: English

Title: MMV- synchronizing multimedia documents: an extension of CDA for synchronization and presentation of multimedia documents

Abstract: The experiences of a prototype implementation are presented, which integrates dynamic media like audio, video, and digital sound (MIDI) into 'static' documents (text, graphics, images), to specify interactively the temporal layout-conditions - synchronization - and to present such documents under interaction with the user. To achieve this, first a...

 \dots M**), including references to the dynamic contents, then the temporal conditions are specified using a **synchronization editor**, and finally the document is presented through a presentation engine, which may be distributed over...

...nodes. The user may interact with the presentation by activating displayed buttons with the pointing **device**. A cue-based **synchronization** model is used, which is event-oriented and allows adjustment for delays caused by hardware...

Descriptors: *Compute r applications; Synchronization; User interfaces; Electronic publishing; Information retrieval systems

Identifiers: Computer aided document processing; Dynamic media; Digital Document Interchange Format; Digital Table Interchange Format

35/3,K/83 (Item 28 from file: 8)
DIALOG(R)File 8:Ei Compendex(R)

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03669571 E.I. No: EIP93071030861

Title: Adaptive feedback techniques for synchronized multimedia retrieval over integrated networks

Author: Ramanathan, Srinivas; Rangan, P. Venkat

Corporate Source: Univ of California at San Diego, La Jolla, CA, USA Source: IEEE/ACM Transactions on Networking v 1 n 2 Apr 1993. p 246-260

Publication Year: 1993

CODEN: IEANEP ISSN: 1063-6692

Language: English

Title: Adaptive feedback techniques for synchronized multimedia retrieval over integrated networks

Abstract: Recent advances in networking , storage, and computer technologies are stimulating the development of multimedia on-demand services providing services similar to those of a neighborhood videotape rental store over metropolitan area networks . In this paper, we develop intermedia synchronization techniques for multimedia on-demand retrieval over integrated networks in the absence of global clocks. In these techniques, multimedia servers use lightweight messages called feedback units transmitted by media display sites (such as audiophones and videophones , generically referred to as mediaphones) to detect asynchronies among those sites. We present strategies by which the server can adaptively control the feedback transmission rate from that mediaphone, so as to minimize the associated overheads without permitting the asynchrony to exceed tolerable limits. We compare the performance of various resynchronization policies such as conservative, aggressive, and probabilistic. Performance evaluation of the feedback techniques indicates that their overheads are negligible; for a typical audio / video playback environment, the feedback frequency was about one in hundred. The media-specific synchronization techniques described in this paper possess an important advantage as compared to those based on clock synchronization : skipping and pausing of media units at the time of resynchronization can be based on the semantic content of the media units , thereby minimizing perceptible degradations in quality of media playback. (Author abstract) 15 Refs.

Descriptors: *Compute r networks; Adaptive control systems; Information retrieval; Synchronization; Metropolitan area networks; Computational linguistics

Identifiers: Integrated networks; Synchronized multimedia retrieval; Feedback units

35/3,K/94 (Item 3 from file: 34)
DIALOG(R)File 34:SciSearch(R) Cited Ref Sci
(c) 2005 Inst for Sci Info. All rts. reserv.

03973249 Genuine Article#: QW532 No. References: 12

Title: MULTIMEDIA STORAGE SERVERS - A TUTORIAL

Author(s): GEMMELL DJ; VIN HM; KANDLUR DD; RANGAN PV; ROWE LA

Corporate Source: SIMON FRASER UNIV/BURNABY/BC V5A 1S6/CANADA/; UNIV

TEXAS, DISTRIBUTED MULTIMEDIA COMP LAB/AUSTIN//TX/78712; IBM CORP, THOMAS

J WATSON RES CTR/YORKTOWN HTS//NY/10598; UNIV CALIF SAN

DIEGO, MULTIMEDIA LAB/LA JOLLA//CA/92093

Journal: COMPUTER, 1995, V28, N5 (MAY), P40-49

ISSN: 0018-9162

Language: ENGLISH Document Type: ARTICLE (Abstract Available)

Title: MULTIMEDIA STORAGE SERVERS - A TUTORIAL . 1995

Abstract: On-line access to multimedia information—like books, periodicals, images, video clips, and scientific data—is both possible and cost—effective, thanks to recent advances in computing and communication. Some media, such as audio and video, are classified as continuous because audio samples and video frames, for example, have meaning only when presented in time. The design of multimedia servers thus fundamentally differs from conventional servers as a result of (1) real—time storage and retrieval requirements, as well as (2) large storage space and data transfer—rate requirements of digital multimedia. In this tutorial, the authors highlight the issues involved in meeting these requirements. For example, the critical components in the design of multimedia services are storage servers that support continuous media storage and retrieval, and network subsystems that synchronously deliver media information, on time, to the client sites.

In their survey of design issues, the authors present disk-scheduling algorithms (optimized for retrieving multimedia information) for real-time recording and playback. The authors also discuss admission control algorithms that let a multimedia server determine whether new services can be added without the server 's violating the real-time requirements of existing ones.

In terms of service, the authors assume that performance requirements of multimedia storage servers include meeting all real-time deadlines, although some applications can tolerate missing one occasionally. Servers have several quality-of-service (QoS) categories: (1) Deterministic--All deadlines are guaranteed to be met; (2...

...probability (perhaps 90 percent); and (3) Background--No guarantees are given for meeting deadlines (the **server** schedules access only when there is time left over after all other service).

The authors also examine techniques for efficiently placing media information on individual disks, large disk arrays, and **storage device** hierarchies. Finally, they describe data structures that a **multimedia** file system must maintain to facilitate random access and efficient **editing**.

```
35/3,K/111
               (Item 11 from file: 94)
DIALOG(R) File 94: JICST-EPlus
(c) 2005 Japan Science and Tech Corp(JST). All rts. reserv.
           JICST ACCESSION NUMBER: 97A0342769 FILE SEGMENT: JICST-E
Multi- Video Stream Play Out and Multi - Media Communication Service for
     AudioLink System.
SAKATANI TOORU (1); WATANABE HIROSHI (1); MARUI HIROJI (1); HOTTA SEIKO
    (1); KOYANO HIROSHI (1)
(1) Nippon Telegraph & Telephone Corp., Human Interface Lab.
Denshi Joho Tsushin Gakkai Gijutsu Kenkyu Hokoku (IEIC Technical Report
    (Institute of Electronics, Information and Communication Enginners), 1997, VOL.96, NO.515 (MVE96 60-67), PAGE.35-38, FIG.4, REF.5
JOURNAL NUMBER: S0532BBG
UNIVERSAL DECIMAL CLASSIFICATION: 681.3:654
                                               681.3:621.397.3
LANGUAGE: Japanese
                            COUNTRY OF PUBLICATION: Japan
DOCUMENT TYPE: Journal
ARTICLE TYPE: Original paper
MEDIA TYPE: Printed Publication
Multi- Video Stream Play Out and Multi - Media Communication Service for
     AudioLink System.
   1997
ABSTRACT:
           Synchronization among multiple video and audio streams is
    discussed, and multi- video stream play out is installed on the
    AudioLink System. Furthermore, synchronization between audio /
    video stream and text/ graphics is discussed. (author abst.)
... DESCRIPTORS: communication control; ...
...signal synchronization; ...
... multi - media ; ...
... computer
               network ; ...
... computer system(hardware...
... internet ; ...
...client server system
... BROADER DESCRIPTORS: regeneration ; ...
... control ; ...
... synchronization ; ...
...communication network; ...
...information network; ...
... network ;
```

```
DIALOG(R) File 94: JICST-EPlus
(c) 2005 Japan Science and Tech Corp(JST). All rts. reserv.
           JICST ACCESSION NUMBER: 95A0928603 FILE SEGMENT: JICST-E
Multimedia office systems integrating groupware with multimedia on
    demand.
MIZUNO HIROMI (1); FUKUOKA HIDEYUKI (1); TANIGUCHI KUNIHIRO (1); TACHIKAWA
    HITOYA (1); SAKAGAMI HIDEKAZU (1); KAWASAKI SHIGEHITO (1)
(1) NEC C&CKen
Denshi Joho Tsushin Gakkai Gijutsu Kenkyu Hokoku(IEIC Technical Report
    (Institute of Electronics, Information and Communication Enginners),
    1995 , VOL.95, NO.255(IE95 51-57), PAGE.35-42, FIG.12, REF.9
JOURNAL NUMBER: S0532BBG
UNIVERSAL DECIMAL CLASSIFICATION: 681.3:654
LANGUAGE: Japanese
                           COUNTRY OF PUBLICATION: Japan
DOCUMENT TYPE: Journal
ARTICLE TYPE: Original paper
MEDIA TYPE: Printed Publication
Multimedia office systems integrating groupware with multimedia on
    demand.
   1995
ABSTRACT: A multimedia platform integrating groupware with multimedia
    on demand is proposed. The multimedia platform integrates stored
    information retrieving with realtime bi-directional communication, and
    the integration is realised by cooperation of groupware servers MCU(
   Multipoint
                 Control
                          Unit )s with multimedia on demand servers .
    Cooperation protocols are developed to realise the server 's
    cooperation without any modification to the existing servers .
   Multimedia
                synchronization control scheme for realtime
    communication is also provided. Multimedia office systems developed on this platform provides both realtime and stored video naturally
    synchronized with audio th the users. (author abst.)
DESCRIPTORS: LAN ; ...
...ATM network; ...
... multi - media ; ...
... synchronous
                  control ; ...
... computer system(hardware...
...client server system
BROADER DESCRIPTORS: computer
                                 network ; ...
...communication network; ...
...information network; ...
... network ; ...
... control ; ...
... computer program
```

(Item 15 from file: 94)

35/3,K/115

```
(Item 18 from file: 94)
DIALOG(R) File 94: JICST-EPlus
(c) 2005 Japan Science and Tech Corp(JST). All rts. reserv.
           JICST ACCESSION NUMBER: 94A0732335 FILE SEGMENT: JICST-E
A Synchronization Mechanism in a Distributed Multimedia System with
    Interactive Control .
ONO RYUICHI (1); AIDA HITOSHI (1); SAITO TADAO (1)
(1) Univ. of Tokyo, Fac. of Eng.
Joho Shori Gakkai Kenkyu Hokoku, 1994, VOL.94, NO.56(DPS-66), PAGE.121-126
, FIG.5, REF.5
JOURNAL NUMBER: Z0031BAO
                           ISSN NO: 0919-6072
UNIVERSAL DECIMAL CLASSIFICATION: 681.51:007.51
                                                 681.3:654
LANGUAGE: Japanese
                         COUNTRY OF PUBLICATION: Japan
DOCUMENT TYPE: Journal
ARTICLE TYPE: Original paper
MEDIA TYPE: Printed Publication
A Synchronization Mechanism in a Distributed Multimedia System with
    Interactive Control .
   1994
ABSTRACT: In this paper, we propose a technique to keep multiple
   Retrieved Media Streams (RMS) synchronized at the time of
   presentation while absorbing load variations in a Distributed
   Multimedia System with Interactive Control (DMSIC) which has been
    implemented on UNIX workstations connected by Ethernet . An
    evaluation of this technique shows that each node can adjust the
    delivery(or presentation) of media units according to the capacity of
    the CPU without being affected by a node with a lower capacity CPU .
    (author abst.)
...DESCRIPTORS: computer network; ...
... multi - media ; ...
... synchronous processing...
... workstation ;
... BROADER DESCRIPTORS: communication network; ...
...information network; ...
... network ; ...
... computer program...
... computer ;
```

```
(Item 24 from file: 94)
35/3,K/124
DIALOG(R) File 94: JICST-EPlus
(c) 2005 Japan Science and Tech Corp(JST). All rts. reserv.
          JICST ACCESSION NUMBER: 89A0248288 FILE SEGMENT: JICST-E
Multi - media
                synchronized
                               storage techniques.
HAYASHI YASUHITO (1); TANIGAWA HIROYA (1)
(1) NTT Hyuman'intafesuken
NTT Denki Tsushin Kenkyujo Kenkyu Jitsuyoka Hokoku(Electrical Communication
    Laboratories Technical Journal), 1989, VOL.38, NO.3, PAGE.289-298,
    FIG.6, TBL.2, REF.1
JOURNAL NUMBER: F0137ABH
                           ISSN NO: 0415-3200
UNIVERSAL DECIMAL CLASSIFICATION: 681.3.02:651.2
                                                  621.391.1
LANGUAGE: Japanese
                          COUNTRY OF PUBLICATION: Japan
DOCUMENT TYPE: Journal
ARTICLE TYPE: Original paper
MEDIA TYPE: Printed Publication
Multi - media
                synchronized
                               storage techniques.
  1989
ABSTRACT: A multi - media
                            synchronized
                                          storage system allows
    communication of sophisticated messages by inputting, storing and
    outputting synchronous composite media-including voice, still
   picture , drawing and pointing. In general, the editing functions are
   essential to storage systems. Above all, this system needs functions
   which maintain synchronization among media data. This paper describes
    a method of establishing a multi - media storage system with
    synchronized editing functions and the effectiveness of the
    resulting system. The established techniques are: (1) data
    segmentation, (2) synchronous composition of multi - media data,
    (3) rapid retrieval of voice data, and (4) editing of
    synchronously restored
                             multi - media data.(author abst.)
DESCRIPTORS: synchronous processing...
...data retrieval ; ...
...data storage; ...
... editing ; ...
...segmentation( computer ); ...
...data retrieval system...
...personal computer;
... BROADER DESCRIPTORS: fact retrieval ; ...
...information retrieval; ...
... retrieval ; ...
...information storage; ...
... storage and accumulation...
...information retrieval system...
... computer application system...
...digital computer ; ...
```

... computer ;

39/3,K/45 (Item 45 from file: 348)

DIALOG(R) File 348: EUROPEAN PATENTS

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00893543

System and method for on-line multimedia access
System und Verfahren fur Online- Multimedia -Zugriff
Systeme et methode d'acces en-ligne a des informations multimedia
PATENT ASSIGNEE:

Sun Microsystems, Inc., (2616592), 4150 Network Circle, Santa Clara, California 95054, (US), (Applicant designated States: all) INVENTOR:

Liu, James C., 520 Alberta Avenue, Sunnyvale, California 94087, (US) LEGAL REPRESENTATIVE:

Harris, Ian Richard et al (72231), D. Young & Co., 21 New Fetter Lane, London EC4A 1DA, (GB)

PATENT (CC, No, Kind, Date): EP 817103 A2 980107 (Basic)

EP 817103 A3 031015 APPLICATION (CC, No, Date): EP 97304262 970618;

PRIORITY (CC, No, Date): US 671581 960628

DESIGNATED STATES: GB

INTERNATIONAL PATENT CLASS: G06F-017/30; G11B-027/00; G10H-001/36;

G07F-017/30 ABSTRACT WORD COUNT: 189

NOTE:

Figure number on first page: 1

LANGUAGE (Publication, Procedural, Application): English; English; English FULLTEXT AVAILABILITY:

Available Text	Language . Update	Word Count
CLAIMS A	(English) 9802	2673 .
SPEC A	(English) 9802	4445
Total word count	- document A	7118
Total word count	- document B	0
Total word count	- documents A + B	7118

System and method for on-line multimedia access
System und Verfahren fur Online- Multimedia -Zugriff
Systeme et methode d'acces en-ligne a des informations multimedia
INTERNATIONAL PATENT CLASS: G06F-017/30 ...

... G11B-027/00 ...

... G10H-001/36

...ABSTRACT A2

Disclosed is a method and system for providing access to **multimedia** content on-line which is **updated** virtually **simultaneously** with the vendor's **update** process. By a user accessing a page on the World Wide Web, for example, data...

- ...downloaded to a user's computer system for quick access. Depending upon the user's **computer** system (**LAN** or a stand-alone personal **computer**), "applets" containing data and instructions are stored for immediate access. In a Karaoke application of...
- ...SPECIFICATION and hardware independent. The Java software architecture is designed to support platforms ranging from personal **computers** to embedded **network devices** of the type similar to a Java desktop device (recently announced by Sun and Oracle...

...explicitly set out in the Claims.

A user of this invention is able to access multimedia content on-line which is updated virtually simultaneously with the vendor's update process. In the event that a vendor updates the data frequently, the user will benefit...

- ...downloaded to a user's computer system for quick access. Depending upon the user's **computer** system (**LAN** or a stand-alone personal **computer**), "applets" containing data and instructions are stored for immediate access. An applet in and of...
- ...completely unaware of the automatic delivery of an applet including data and instructions from a main data base server. When the user accesses a page, a song list and other information is displayed on...to enable the user to make choices and thus send a request to a remote server for the delivery of multimedia content. Once authentication has taken place, one or more applets are sent by the remote server which deliver the multimedia content.

Applets are stored in a network of servers for efficient delivery to a user. FIG. 1 shows a main database 72 in communication with caching subservers 74a, 74b, 74c, 74d and 74e. The main server defines the 'master database of all songs released. This database can rely on any known database technology whose hardware will usually reside at the central distribution site for data defined by the implementor. Multiple main servers are permitted for redundancy.

Caching subservers define a location specific server which caches songs for...

- ...local Karaoke clients. The purpose of the caching subservers is to reduce load on the main server generated by song requests, and reduce long distance network traffic to the main server by caching songs locally. If a caching server does not have in memory, a song...
- ...master list. Subserver 74e is further shown in communication with subservers 76a, 76b and 76c. **Networked computers** may be arranged in other configurations as well.

An array of dedicated Karaoke terminals 78a...

- ...a mouse. Alternatively, the Karaoke page is accessed, for example, by a user's personal computer, LAN, laptop, PDA, workstation, television or telephone 82a, 82b or 82c, wireless or wired. In any manner of transmission from...at box 42 (see FIG. 3) the applet calls back to the database (stored on main server 72 or a subserver) to request audio, video, timing and lyric information at box 88. At box 92, to deliver the content in...above, the Karaoke applets run inside a browser, providing for the user selection of a song, downloads audio, downloads the video images, downloads the ASCII lyrics and downloads the timing data. Each download occurs using a separate thread
- CLAIMS 1. A system for providing on-line **multimedia** content output to a user on said user's **computer** system, comprising:
 a browser configured to provide access to a page and at least one...
- ...and wherein said component further includes instructions which when executed synchronize the delivery of said multimedia data elements;
 - a transmitter configured to automatically download said at least one component to said user's computer system including a display

- apparatus; and
- an execution unit configured to execute said instructions to generate multimedia content output including audio output from said audio data element, text output from said text...
- ...configured to display unencrypted data in a manner which enables said user to make a **multimedia** content output choice; an output **unit** configured to generate on said display unit a
 - an output unit configured to generate on said display unit a representation of unencrypted data in a manner which enables a user to make a multimedia content choice and an authentication request;
 - a **processor** configured to generate a **multimedia** content output choice and an authentication request;
 - an execution unit configured to execute said request for authentication in order to provide a key to decrypt...
- ... to generate multimedia content output therefrom;
 - a receiver configured to receive said authentication; and
 - a processor configured to generate multimedia content output.
 - 9. A system as recited in Claim 1 wherein said audio data element...
- ...multimedia data elements is queued for sequential delivery.
 - 12. A method for providing on-line **multimedia** content output to a user on said user's **computer** system, comprising the steps of: via a browser, providing access to a page and at...
- ...and wherein said component further includes instructions which when executed synchronize the delivery of said multimedia content data elements to said user's computer system;
 - automatically downloading said at least one component to said user's computer system; and
 - executing said instructions to generate **multimedia** content output including audio output from said audio data element in the form of a ...said delta time.
 - 25. A method for providing to a user, on said user's **computer** system, on-line access to **multimedia** content, comprising the steps of: via a browser, providing access to a page containing at...
- ...method as recited in Claim 25 wherein said multimedia generating step comprises the following steps:
 - storing and delivering multimedia audio , graphics , text and
 timing data elements;
 - storing and delivering instructions which when executed synchronize
 the delivery of said multimedia data elements; and...
- ... output in accordance with said timing data element.
 - 27. A system for providing on-line multimedia content output to a user on said user's computer system, comprising.
 - browser means for providing access to a page and at least one component
- ...and wherein said component further includes instructions which when executed synchronize the delivery of said multimedia data elements;
 - downloading means for automatically downloading said at least one
 component to said user's computer system; and
 - execution means for executing said instructions to generate **multimedia** content output including audio output from said audio data element, text output from said text...
- ...said user to choose songs from said list so that said delivery of said

- songs' multimedia data elements is queued for sequential delivery
 31. A server , comprising:
- a storage unit configured to store a browser embedded component, including multimedia audio, graphics, text and timing data elements, instructions which when executed synchronize the delivery of said multimedia...an applet.
- 38. A computer-readable medium having computer readable code stored therein, comprising:
- a computer -readable code module configured to store multimedia audio , graphics , text and timing data elements and instructions which when executed synchronize the delivery of said...
- ...38 wherein said audio output when executed resembles the sound of metals balls clanging, such audio output delivered in a synchronized manner with said graphics output in accordance with said timing element.
 - 45. A **computer** readable medium as recited in Claim 38 wherein said audio data element is fragmented into...

```
Items
                Description
Set
                AUDIO? OR VOICE? OR SOUND? OR MUSIC? OR SONG? OR ACOUSTIC?
       455129
S1
             OR JUKEBOX?
S2
       626101
                VIDEO? OR VTR OR VCR OR PHOTOGRAPH? OR GRAPHIC? OR PICTUR?
             OR PICTOR? OR STILL() IMAGE? OR MOVIE? OR (MOTION? OR MOVING) (-
             ) IMAGE?
                TV OR TELEVISION? OR MPEG OR JPEG
       287758
S3
S4
        48635
                DVD OR DVDS OR DIGITAL?() (CONTENT? OR DATA OR INFO OR INFO-
             RMATION?) OR DIGITAL?()(VIDEO OR VERSATIL?)()(DISC? OR DISK? -
             OR RECORDER?) OR DVR OR DVRS
S5
                MULTIMEDIA? OR MULTI() MEDIA?
       112676
                DEVICE? OR UNIT? ? OR MODULE? ? OR APPLIANCE? OR EOUIPMENT?
S6
      1212741
              OR SERVER? OR TERMINAL? ? OR STATION? ?
S7
                CONTROLLER? OR COMPUTER? OR CPU OR CPUS
      1013660
                CENTRAL() PROCESS? OR PROCESSOR? OR MICRO() PROCESS? OR DATA-
S8
       435921
             () PROCESS? OR MICROCOMPUTER? OR WORKSTATION? OR WORK() STATION?
S9
      1366822
                CHIEF? OR MAIN OR MANAGER? OR MANAGING? OR MASTER? OR CENT-
             ER? OR CENTRAL? OR COMMAND OR BASE
                HUB OR HUBS OR PRIMARY OR PRINCIPAL OR CONTROLLER? OR CONT-
S10
       579441
             ROLLING? OR CONTROL
S11
       817041
                MULTIP? OR MULTIT? OR SEVERAL? OR NUMEROUS? OR MORE (2W) ONE
             OR TWO(2W) MORE OR ASSEMBLY? OR ASSEMBLIE?
      1130664
                COLLECTION? OR NETWORK? OR LAN OR WAN OR LANS OR WANS OR I-
S12
             NTERNET? OR ETHERNET? OR EXTRANET?
S13
       575265
                ONLINE? OR INTRANET? OR COMMUNICAT? () SYSTEM? OR WAP OR WAPS
              OR LIBRAR? OR ARCHIV? OR VARIET?
S14
                SYNCHRON? OR SYNCRON? OR COINCID? OR SIMULTAN? OR (RENDER?
       133611
             OR MAKE? OR MAKING OR MADE) () IDENTICAL? OR IDENTICALIZ? OR ID-
             ENTICALIS? OR RESYNCRON? OR RESYNCHRON?
                ("SAME" OR IDENTIC? OR SIMILAR?)()TIME? ? OR SYNC?? OR SYN-
S15
       128092
             K?? OR CONTEMPORAN? OR CONCURREN? OR COOCCURR? OR CO()OCCUR?
S16
       418199
                UPDAT? OR UP(2W)DATE OR RESET? OR REFRESH? OR RELOAD? OR R-
             ESTOR? OR RENEW? OR REENABL? OR EDIT?? OR EDITING
S17
       256457
                PATCH? OR UPGRAD? OR FIXUP? OR REGENERAT? OR REPLENISH? OR
             REVITAL? OR REJUVENAT?
                DOWNLOAD? OR DOWN()LOAD? OR UPLOAD? OR UP()LOAD? OR INSTAL-
S18
       375471
             L? OR (DOWN OR UP) () LINK? OR DOWNLINK? OR UPLINK?
       409902
S19
                RETRIEV? OR STORE? OR STORING? OR STORAG? OR RECORDING?
                (DATA OR FILE? OR RECORD?) (3N) (TRANSFER? OR TRANSMI? OR OF-
S20
       107242
             FLOAD? OR UNLOAD? OR FEED? OR FLOW?)
          223
S21
                ARQPRO OR ARQ()PRO OR AUDIOREQUEST()PRO OR AUDIO()REQUEST(-
             ) PRO OR AMX OR REQUEST() (MULTIMEDIA OR MULTI() MEDIA)
S22
       103530
                (S1(10N)S2 OR S3:S5)(10N)S6:S8
S23
           40
                S21 AND S14:S15
                S22 AND S14:S15(10N)S16:S20
S24
         1987
S25
                S24 AND S9:S13(10N)S6:S8
         1584
S26
         1060
                S25 AND S16:S17 AND S18:S20
S27
         1405
                S25 AND S9:S10 AND S11:S13
S28
          989
                S26 AND S27
S29
           34
                S28 AND S14:S15(5N)S16:S17 AND S14:S15(5N)S18:S20
S30
          375
                S28 AND S14:S15(5N)S1:S5
S31
          862
                S28 AND S1:S5(5N)S6:S8
S32
          343
                S30 AND S31
S33
           4
                S32 AND S14:S15/TI
           78
S34
                S23 OR S29 OR S33
S35
           64
                S34 AND PY<2002
S36
                RD (unique items)
           62
          989
S37
                S28:S32
S38
                S37 AND S14:S15/TI
S39
                S38 NOT S33
                S39 AND PY<2002
S40
```

```
RD (unique items)
S41
             37
                    S37 AND S16:S20/TI AND S1:S5/TI
S42
                    S42 NOT (S38 OR S34)
             32
S43
             24
                    S43 AND PY<2002
S44
S45
             24
                    RD (unique items)
? show files
File 275: Gale Group Computer DB(TM) 1983-2005/Jul 22
           (c) 2005 The Gale Group
File 634:San Jose Mercury Jun 1985-2005/Jul 21
(c) 2005 San Jose Mercury News
File 647:CMP Computer Fulltext 1988-2005/Jul W1
(c) 2005 CMP Media, LLC
File 674: Computer News Fulltext 1989-2005/Jul W3
           (c) 2005 IDG Communications
File 696:DIALOG Telecom. Newsletters 1995-2005/Jul 22
           (c) 2005 The Dialog Corp.
```

(Item 7 from file: 275) 36/3, K/7DIALOG(R) File 275: Gale Group Computer DB(TM) (c) 2005 The Gale Group. All rts. reserv.

SUPPLIER NUMBER: 54221061 (USE FORMAT 7 OR 9 FOR FULL TEXT) SMIL: The New Web Format For Multimedia . (Synchronized Integration Language) (Technology Information)

Stanek, William Robert

PC Magazine, 233(1)

Feb 9, 1999 ISSN: 0888-8507 LANGUAGE: English RECORD TYPE: Fulltext; Abstract WORD COUNT: 3530 LINE COUNT: 00280

SMIL: The New Web Format For Multimedia . (Synchronized Multimedia Integration Language) (Technology Information)

ABSTRACT: Synchronized Multimedia Integration Language (SMIL) allows users to combine still images, audio, text, video and animations to...

TEXT:

...the chills, so I click on over to CNN and cue a video from the archives (Figure 1). Suddenly I realize that I'm watching a video recorded weeks ago, and ...

How is this possible? The answer is SMIL (Synchronized Multimedia Integration Language, pronounced smile). With SMIL, you can combine text, still images, audio, video, and...

...studios to create SMIL presentations, and you don't need to buy time on cable networks to broadcast your productions to the world either. In fact, all you need to create...

...you view a SMIL production you'll be amazed, especially when you realize the sophisticated control the protocol offers. For example, by adding a time line to a presentation, you can control when content is displayed and how transitions between various content types are handled. By defining layout regions, you can combine multiple forms of media and display them simultaneously. And by setting choices, you can even serve...

... see SMIL in action, you need a compatible player such as RealPlayer G2. Once you download and install the player, you can view SMIL presentations. The screenshot in Figure 2 shows a presentation...

...the scenes, the presentation's bandwidth needs are optimized based on the speed of your Internet connection. That is, the media files used by the presentation will depend on whether you...

...on channels, such as the Screening Room channel shown in Figure 2. Channels are like TV stations with content you can access on demand. Thus you determine the viewing schedule; you don...

...access those channels as easily as you access channels on your TV with a remote control . You simply click on the button of the channel you want to view. You can...

...you could even create the layout and design of SMIL presentations using a standard text editor if you really wanted to.

Early work on SMIL began in December 1995. The specification...

...behavior of multimedia presentations and the way media objects use hypertext links.

SMIL Players And Servers

SMIL players are client applications that receive and display integrated **multimedia** presentations. Like other client applications, SMIL players are only one side of the equation. SMIL...

...are also necessary.

Although SMIL itself is an open technology, some of the players and servers use proprietary techniques to handle multimedia streaming and encoding. This means you may be tied to a specific vendor for your...

... Hypermedia Presentation and Authoring System), RealPlayer G2, and RealPlayer Plus G2.

GRiNS combines a SMIL **editor** and player into an integrated system for working with SMIL presentations. You use GRiNS's **editor** component to create the markup necessary for SMIL presentations and the player component to play...

...back SMIL and HSL (Hypermedia Synchronization Language) files. HSL is an alternative format for creating **synchronized multimedia** presentations available from Digital **Equipment** Corp. (www.research.digital.com/src/HPAS).

GRINS and HPAS are fairly versatile, but RealNetwork configured multimedia servers such as RealServer from RealNetworks. These servers are configured to handle multiple forms of media including text, audio, video, and animation, and they understand hypertext links. Thus you can provide links within a presentation...

...Because SMIL is a fairly new technology, there aren't many compatible servers. The showcase **server** available today is RealServer, which is available in a **variety** of configurations designed to fit specific needs. Because there's a version especially designed for ISPs, you may find that your ISP account can be **upgraded** to include support for SMIL presentations for a small additional charge. Keep in mind that...

...version will need to be the latest G2-compliant version. Streaming and SMIL

With traditional multimedia files, such as MPEG video or AIFF audio, the playback device has to wait for the entire file to download before playback can begin. Streaming technology, on the other hand, lets multimedia servers send content in a continuous stream that can be decoded and played back shortly after being received. While it may take several minutes to download an MPEG video clip, a streamed video clip can begin to play within seconds. This...

...streamed presentations enjoyable--even on a 28.8 modem.

To enable streaming, the developers of multimedia servers had to rethink the way data is transmitted over the Web, because when it comes to synchronized media and streaming, HTTP isn't the best protocol to use. HTTP doesn't understand...

...for time-based seeking within a presentation. The protocol also supports multicasting for simultaneously broadcasting multiple files. You'll find RTSP at work in RealServer and in Netscape Media Server.

Microsoft...

...or ASF. But ASF requires you to stuff all your multimedia objects into a single **file** that is **transmitted** to the client packet by packet. RTSP, in contrast, uses the Web's standard URLs...

...the SMIL document and then create the actual media objects afterward. If you want to update a video clip in the presentation later, you would need

to recreate the entire presentation with ASF, but with RTSP you simply save the **updated** video clip to the expected location.

Creating SMIL Presentations Now let's take a look...

...be displayed fully in the viewing window and automatically resized as necessary. But to play multiple media types simultaneously, you create miniwindows within the main viewing area, called regions.

You can think of regions as cells within a table. As...

...top="40" left="30" width="180" height="180"/> </layout>

In this example we size the **main** viewing area <identified with the <root-layout>tag> to 250 by 230 pixels and then...

...viewing area: MyTextRegion and MyVideoRegion. MyTextRegion is positioned 5 pixels to the right of the main viewing area's left edge and 5 pixels down from the top of the main viewing area. MyVideoRegion is placed 30 pixels to the right of the main viewing area's left edge and 40 pixels down from the top of the main viewing area.

Once you've decided on the layout, you create a time line to...

...sequentially (one file right after another, normally in a single region) or in parallel, where **multiple** files can play simultaneously. When you present files in parallel, you can synchronize elements to...

...together. For example, you could create descriptive text files that highlight key moments in a **video** clip and then **synchronize** the display of those files with the **video** clip's time line.

Synchronization is at the core of SMIL, and as you would expect, SMIL provides many features for controlling the timing of media playback. You can set an explicit duration for a media clip...

...The <switch> tag tells the player it has a choice to make. Anytime you provide multiple routes through a presentation, you have to use this tag. Because bandwidth choices are evaluated...As we noted earlier, you could create the necessary markup file using your favorite text editor. SMIL editors are starting to debut, however, and two good ones to look at are T.A.G. Editor 2.0 for RealSystem G2 from Digital Renaissance (tag.digital-ren.com) and V-Active...

...any problems. Enjoy!

William Stanek is a frequent contributor to PC Magazine and author of several books, including FrontPage 98 Unleashed, Learn the Internet in a Weekend, and Increase Your Web Traffic in a Weekend. You can contact him at writing@tvpress.com.

FIGURE 1: SMIL lets you comfortably access **several** multimedia files at once, even with a slow **Internet** connection.

FIGURE 2: SMIL productions are delivered on channels, such as the Screening Room channel...

19990209

36/3,K/28 (Item 28 from file: 275)
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01745245 SUPPLIER NUMBER: 16548267 (USE FORMAT 7 OR 9 FOR FULL TEXT)
Media distribution systems bring a world of information into classrooms.

(includes related table of vendors)

Carmona, Jeff

T H E Journal (Technological Horizons In Education), v22, n6, p12(4) Jan, 1995

ISSN: 0192-592X LANGUAGE: ENGLISH RECORD TYPE: FULLTEXT; ABSTRACT WORD COUNT: 1782 LINE COUNT: 00156

...ABSTRACT: media and classrooms having access to the media through a monitor and remote control panel. AMX Corp offers the Synergy Electronic Classroom System with features that include off-line recording of... are students, who can access a broader world of information without

ever leaving their desks.

* AMX 's Synergy Systems Whether exploring ancient history on CD-ROM encyclopedias or watching breaking news...

...are part of a dynamic multimedia learning environment with the Synergy Electronic Classroom Systems from AMX Corp.

Some of the features of this system are programmable off-line recording of satellite...

...track usage by courseware, instructor and equipment. A master clock in the media center computer **synchronizes** all rooms and schedules; it can even interface to a period bell.

SchoolNet runs over...

COMPANY NAMES: AMX Corp...

TRADE NAMES: AMX Synergy Electronic Classroom Systems (Special-purpose computer system...

19950100

36/3,K/53 (Item 2 from file: 647)
DIALOG(R)File 647:CMP Computer Fulltext
(c) 2005 CMP Media, LLC. All rts. reserv.

01221418 CMP ACCESSION NUMBER: EET20000821S0004

Digital jukeboxes, Web players gear up despite copyright concerns - Home stereo tunes in Web music

Junko Yoshida and Margaret Quan

ELECTRONIC ENGINEERING TIMES, 2000 , n 1127, PG1

PUBLICATION DATE: 000821

JOURNAL CODE: EET LANGUAGE: English

RECORD TYPE: Fulltext SECTION HEADING: News

WORD COUNT: 1257

2000

... Calif.), joining early entries sold over the Web from small players like Remote Solutions and **Request Multimedia**. That's well in advance of the Secure Digital Music Initiative's definition of an...

 \ldots said Hock Leow, chief technology officer and senior vice president at Creative Labs.

At the **same time**, S3's Reed said, "Our challenge is to pick the right format. It is our...
...site.

Other companies have introduced non-SDMI-compliant digital audio jukeboxes as well. In April, **Request Multimedia** Inc. (Troy, N.Y.) rolled out a \$799 jukebox for digital audio based on an...

...formats, but can also support Windows Media Audio formats via an Internet download.

SDMI sidestep

Request Multimedia president Steve Vasquez said the company avoided dealing with the issue of SDMI-mandated content audiorequest.com.

Like its larger competitors, Request Multimedia envisions the home MP3 system as "the central point for music in the home," Vasquez... ... COMPANY NAMES (DIALOG GENERATED): Forward Concepts Inc; Fujitsu; Hango; InterTrust Corp; IBM Corp; Microsoft Corp; Real Networks; Remote Solutions; Request Multimedia Inc; Rio Division; Secure Digital Music Initiative; Sony; S3 Inc; Universal Music Group; Windows Media